DOCUMENT RESUME

ED 161 662 SE 024 176

AUTHOR	Liebrenz, Marilyn L., Ed.
TITLE	Supervisory Management in the Water/Wastewater Field: Self Study Program. Revised Second Edition. Textbook and Student Manual. Lessons 1-7 and Appendix. Executive Programs of the Graduate School of Business Administration of Michigan State University.
INSTITUTION	Michigan State Univ., East Lansing. Coll. of Business.
SPONS AGENCY	Environmental Protection Agency, Washington, D.C. Office of Water Programs.
PUB DATE	77
NOTE	392p.; Some colored pages will not reproduce well; Contains occasional light and broken type
EDRS PRICE	MF-$0.83 HC-$20.75 Plus Postage.
DESCRIPTORS	Certification; *Environmental Technicians; *Instructional Materials; Job Skills; Pollution; *Postsecondary Education; *Professional Training; *Supervision; Waste Disposal; *Water Pollution Control
IDENTIFIERS	Waste Water Treatment; Water Quality; *Water Treatment

ABSTRACT

This document is the student manual for a self-study course on managerial principles as they relate to the water or wastewater treatment field. Each of the seven lessons is concerned with a segment of the management process and corresponds to reading material in the accompanying text. An objective and subjective test portion is included in each lesson. Topic areas are: introduction; responsibility toward delegation and motivation; problem-solving and communication skills; planning and organizing; staffing; responsibility in directing and controlling; and relations with the unions and employees. A management-audit format is provided in the appendix. (CS)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

U.S. DEPARTMENT OF HEALTH,
EDUCATION & WELFARE
NATIONAL INSTITUTE OF
EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

Clark E. DeHavens

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC) AND USERS OF THE ERIC SYSTEM."

ED161662

SE 024 176

MICHIGAN STATE UNIVERSITY

GRADUATE SCHOOL OF BUSINESS ADMINISTRATION
OFFICE OF THE DEAN
432 Eppley Center

EAST LANSING · MICHIGAN · 48824
Telephone (517) 353-8711

Dear Student:

This manual has been specifically written for you in the water or wastewater field. Its purpose is to apply managerial principles to this particular field. We are most happy to welcome you to this class--the self study course on managerial principles. Our concern is that this course provide you with both a solid groundwork in the area of management and a pleasant yet challenging learning experience.

To do this, we have created a scenario which carries through all seven lessons, and is designed to present and apply these principles. We cannot be all things to all people, however, and the utility in this manual may be a bit larger or a bit smaller, than the one you are familiar with. In addition, this manual is intended to relate both to the water treatment area and the wastewater treatment field. For this reason, some descriptions may seem, to you, to be vague or general or even confusing.

If you are misled by any part of this manual, however, please write and tell us. Your comments and suggestions regarding improvements in this course will play a vital part in helping to make this course more beneficial for managers across the United States. This, in turn, will help to provide better water and wastewater services for everyone.

This is the Student Manual, which contains seven lessons, including the test portions. The textbook, Supervision: Concepts and Practices of Management by authors Theo Haimann and Raymond Hilgert has been selected to accompany this manual. Complete Lesson One at your earliest convenience and mail the answers back to us. Remember, if you have any questions do not hesitate to write or call. On behalf of the representatives of the Environmental Protection Agency in Washington, D. C. who sponsored the development of this course, Mr. Clark E. DeHaven, Director of Executive Programs at Michigan State University, and the course consultants: Dr. Helferich, Mr. Langworthy, and Dr. Hepler, I wish you a most successful and rewarding forthcoming experience.

Sincerely,

Marilyn L. Liebrenz

Marilyn L. Liebrenz
Program Coordinator

Supervisory Management in the Water/Wastewater Field

Self-Study Program Revised Second Edition

Prepared by: Michigan State University
Under the supervision of: Clark E. DeHaven
Director of Executive Programs, College of Business

Dr. Omar Keith Helferich
Content Consultant

Marilyn L. Liebrenz
Editor and Program Coordinator

Virgil W. Langworthy
Editorial Consultant

Dr. Hal W. Hepler
Communications Consultant

Linda Boston
Illustrator

Michael McClain
Cover Design

for the
ENVIRONMENTAL PROTECTION AGENCY
Office of Water Program Operations
Municipal Operations and Training Division
Manpower Planning and Training Branch

1977

Editor's Note:

There is nothing like working on the revision of a book to make one aware of the numerous changes which are occurring during our lifetime. This revised second edition of the manual for the correspondence course incorporates many of those changing aspects which are affecting the water and wastewater fields.

Since the initial publication of this course, we are already seeing an increasing emphasis on the managerial aspect of training in the water and wastewater field.

This emphasis has appeared in the major associations. For example, Donald K. Shine, Director of the Michigan Section of the American Water Works Association, noted in the October 1976 Newsletter that "if we are to overcome the effects of inflation and the energy crisis, it has to be done through the application of improved management techniques." James H. Suddreth, manager of education for the Water Pollution Control Federation, organized the pre-conference workshop of the WPCF around the aspect of training, including managerial training. James E. Shamblin, Director for the Center for Local Government Technology at Oklahoma State University, emphasized the managerial aspect of training in his talk at the National American Public Works Association meeting in Chicago.

Managerial training is increasingly becoming an area considered for testing in connection with certification. Individual superintendents and managers have indicated a great concern toward obtaining managerial training for those middle managers and employees under them. Similarly, there is a recognition 'down the line' that superiors should also receive some training in organizational management.

This edition of the manual contains numerous additions in content, additional examples, and other learning aids. We have kept the general format of the first edition, including the on-going case example involving Wilbur Wainwright at the River City Utility, but several of the situations have been revised to make the example even more illustrative of problems facing managers in water or wastewater utilities.

Several chapters in the manual have been restructured to complement the revision of the accompanying textbook, Supervision: Concepts and Practices of Management, 1977, by Theo Haimann and Raymond L. Hilgert. Linda Boston, the illustrator for the first edition, has provided supplementary illustrations for this second edition.

As with the initial edition, this manual is the result of great teamwork and devotion above that required by the time clock and paycheck. Several individuals deserve to be commemorated in particular:

> Linda Boston, the illustrator for the first edition, has provided supplementary illustrations for this second edition. Since publication of the first edition, she has become an illustrator for Ambrose Associates, Inc. in Detroit;

> Cheryl Garbukas, Paula Johnson, and Karen Woehlert spent many long hours at the typewriters in completion of this rewrite;

> Michael McClain completed the new design which enhances both the cover page of the manual and also provides the theme for the accompanying brochure;
>
> Others, including Clark E. DeHaven, Omar Keith Helferich, Virgil Langworthy, and Hal Hepler, who have been instrumental from the origin of this course, have been continuously involved with this revision, and already are looking ahead to the third version.

The initial preparation for this self-study course began in June of 1973 and these intervening four years have been filled with the efforts of many people who have provided substantial contributions to this course.

A word of thanks must go the the Environmental Protection Agency, especially its representatives, Frank Lapensee and Robert C. Rose, in the Office of Manpower Development, who have been patient, helpful and considerate to work with throughout the administration of the Federal Grant. In a total sense, this course as well as the seminars that preceded it would never have come into existence without such aid.

A great word of appreciation also goes to Mr. Clark E. DeHaven, Director of Executive Programs at Michigan State University, who has overseen the administration of the grant and its subsequent amendments. His care, concern and inspiration have made this course into this excellent product.

Three consultants have been the backbone of this course, Dr. Omar Keith Helferich, Mr. Virgil W. Langworthy, and Dr. Hal W. Hepler. Dr. Helferich is responsible for the great innovative effort of the Management Audit, which forms an integral part of this course, as well as much of the organization and structure of the course itself. He has put the theories of management into the world of the water/wastewater system.

Mr. Langworthy has provided even closer contact with the water and wastewater treatment facilities, producing numerous actual examples which illustrate how managerial facts and ideas are to be found in this field. In addition, he has been constantly concerned with the practical aspects of the course, both in terms of relating its content to potential examination areas in the industry, and in representing the course at conferences and institutes.

Dr. Hepler has been the person who has tied the content and construction of the course together to produce a harmonious and smooth-flowing piece of work. He has been responsible for maintaining a consistent approach and writing style, and has constantly been available for rewrites and critiques.

Construction of this course would also not be complete without thanking the two groups of students who have participated in the field tests which have been run on the course. Their patience and comments have provided us with an ability to see the course through their eyes, and to improve it substantially.

Two outside reviewers have greatly aided the preparation of this course: Dr. Kenneth D. Kerri at the California State University in Sacramento, originator of the extensive self-study course for operator training, among other courses; and Dr. Elie Namour, at that time of Bentley College in Waltham, Massachusetts. Both professors carefully edited the extensive initial draft of the course and its subsequent revision, providing both general comments as well as specific comments on each portion. Their suggestions prompted some substantial improvements in the course, and the manual is far better because of their critiques.

Last, but certainly not least, a great note of appreciation goes to the people who have been involved in the initial construction of the manual. This includes:

> Linda Boston, the illustrator, who completed the first series of drawings about the same time as she was finishing her degree at Michigan State University;
>
> Mrs. June Christensen, who patiently took phone messages, collected the mail, and provided a constant contact;
>
> Kathy Stopa, the conference coordinator who organized the seminars leading to this self-study course and ordered the textbooks and notebooks for this course. She is even responsible for the hand-lettered certificates sent to all individuals who complete the course;
>
> Pamela Goldberg, who has typed and retyped the course from its first draft to the first edition and handled all desk correspondence during the summer;
>
> Karen Woehlert and Mara Alexander who provided the extra hands needed during rush sessions;
>
> And all others who have contributed their share to make this course the success and educational tool that it is today.

To one and all who have made this second edition possible and a reality, my grateful thanks.

Marilyn L. Liebrenz, Editor and Program Coordinator

TABLE OF CONTENTS

Editor's Note i
Preface vii
Introduction ix

I. LESSON ONE - Introduction to Management

Section 1: The Importance of Being a Manager 5
Assigned Text Reading: Chapter 1

Section 2: The Functions of a Manager 25
Assigned Text Reading: Chapter 2

Objective and Subjective Test Portion 65

II. LESSON TWO - The Manager's Responsibility Toward Delegation and Motivation

Section 1: Delegation: Authority and Responsibility 81
Assigned Text Reading: Chapter 3

Section 2: The Manager and Motivation 107
Assigned Text Reading: Chapter 4

Objective and Subjective Test Portion 139

III. LESSON THREE - The Supervisor's Need for Problem Solving and Communication Skills

Section 1: Problem Solving and Decision Making 153
Assigned Text Reading: Chapter 5

Section 2: The Communicating Manager 179
Assigned Text Reading: Chapter 6

Objective and Subjective Test Portion 211

IV. LESSON FOUR - Planning and Organizing

Section 1: The Manager and Planning 233
Assigned Text Reading: Chapters 7 and 8

Section 2: The Manager and Organizing 255
Assigned Text Reading: Chapters 9, 10, and 11

Objective and Subjective Test Portion 283

TABLE OF CONTENTS
(continued)

V. LESSON FIVE - Staffing

Section 1: The Supervisor in Personnel Selection and Training . . . 299
Assigned Text Reading: Chapters 12 and 13

Section 2: Supervisory Expertise in Employee Performance Appraisal . 323
Assigned Text Reading: Chapter 14

Objective and Subjective Test Portion 345

VI. LESSON SIX - The Manager's Responsibility in Directing and Controlling

Section 1: The Manager and Directing 365
Assigned Text Reading: Chapters 15, 16, and 17

Section 2: The Manager and Controlling 383
Assigned Text Reading: Chapter 18

Objective and Subjective Test Portion 405

VII. LESSON SEVEN - Managerial Relations with the Union and Employees

Managerial Relations with the Union and Employees 423
Assigned Text Reading: Chapters 19 and 20

Objective and Subjective Test Portion 449

APPENDIX - Total Review of Audit 485

PREFACE

This Self Study Course should help you:

1. deal more effectively with the managerial problems that occur in your work;
2. develop managerial skills that will help to eliminate or minimize future problems;
3. become acquainted with a managerial approach which will aid you in your present position and in future managerial positions.

You will have direct interaction with the professors involved in this course. Your lessons are individually scored, and will be returned to you promptly. You are encouraged to ask any questions which may be bothering you and to bring up any problems which you have encountered. In fact, relevant application of the lesson content to your problems is a vital part of these lessons. You will gain skill in solving those problems through analyzing particular problems, and you will learn to apply the lesson content to those problems. You will also be preparing yourself for higher level positions.

These lessons have been composed with you in mind. Many managers have advanced from more technically-oriented jobs and have never been given the opportunity to study managerial techniques. This course is one means of correcting that problem.

A MSU Certificate of Completion will be awarded when you successfully complete this course. This will be visible evidence of your interest in improving your management capability. You will receive six (6) Continuing Education Units (CEUs) for successful completion of this course. These will be permanently recorded at Michigan State University.

A Continuing Education Unit is not the same as a college credit, but is defined as "Ten contact hours of participation in an organized continuing education experience under responsible sponsorship, capable direction, and qualified instruction" for each unit.

CEUs are a nationally recognized recording device for substantive non-credit learning experiences and are an appropriate measure of in-service education and training.

In summary, this course:

1. gives you a working knowledge of management techniques
2. provides application of these techniques to water/wastewater utility management, and
3. includes a certificate of completion, a tangible reward to you for your time and effort, and a permanent record of your six Continuing Education Units.

SUPERVISORY MANAGEMENT IN THE WATER/WASTEWATER FIELD

Being a supervisor or a manager is not easy. You know that. It does have its rewards: employees look up to you, you often have more attention than other employees, and you have a major role in many decisions. But the supervisor or middle manager is strictly that--the person IN the middle. Upper management may not always see things the way that the supervisor's employees do--and the supervisor is often blamed by both sides.

The distinction is sometimes made between middle management and the supervisor, placing the supervisor in a position directly below those in the middle management area. For the purpose of this course and the general discussion, however, the supervisor is taken to be "a supervisor", meaning that this person is in charge of supervising others without being the ultimate boss, and is part of the "middle management" group.

This course is designed for individuals in the following job categories:

A. Large plant with several departments, such as engineering and maintenance, operations, or administration. At the first level you may be:

   1. the supervisor of one or more employees in any one of the departments

   2. the middle manager - manager of one or more supervisors

B. Small plant in which separate departments may or may not exist. There you find:

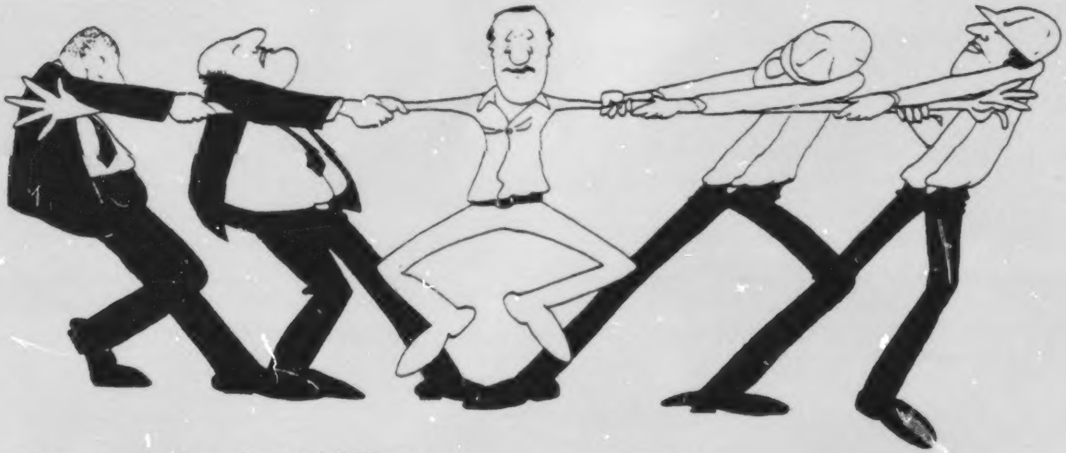
   1. the supervisor

   2. the top manager or superintendent

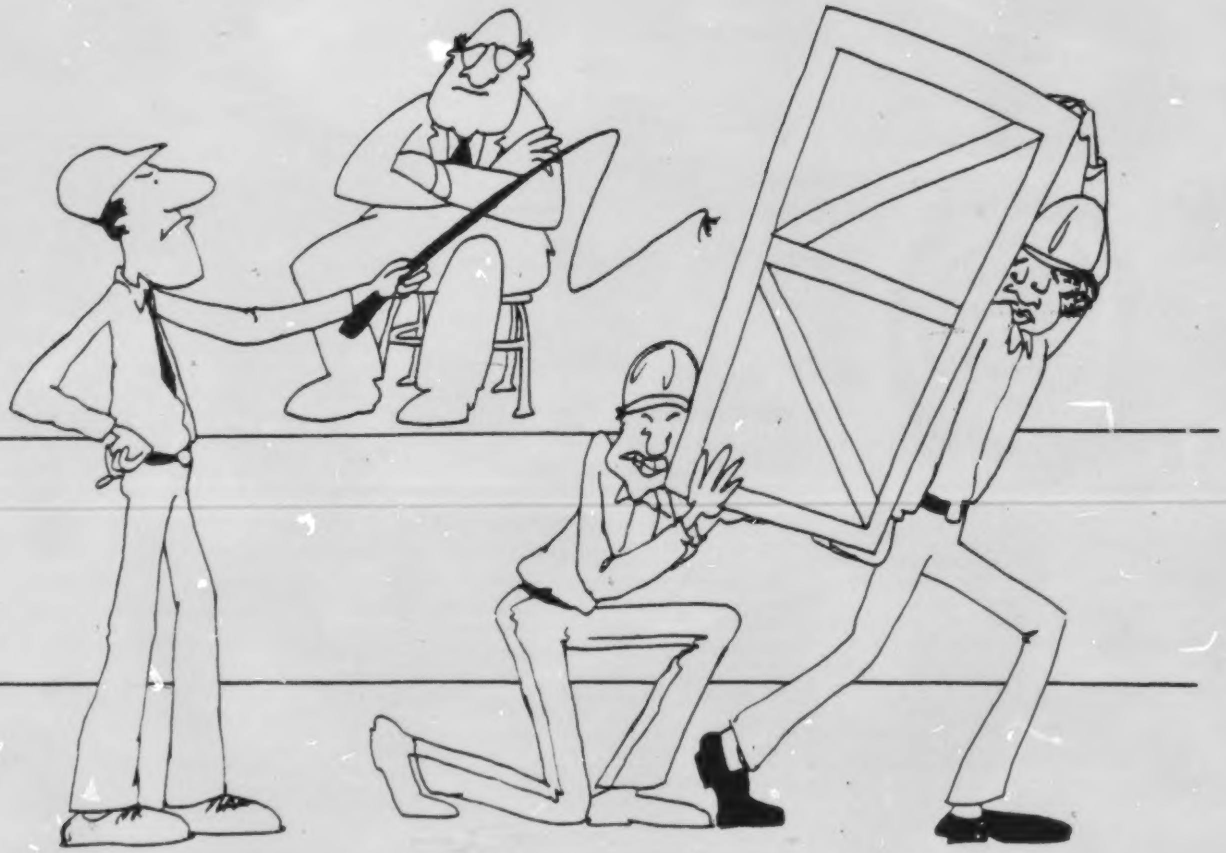
This course is relevant whether you are employed in a water or wastewater utility that has many levels of employees or in a small plant where perhaps only two of you are working. In a small plant, you may not consider one or the other the "boss" but as co-workers. You may be the chief operator of a treatment plant, or the foreman of a field crew, or the head of accounting, personnel, or purchasing. You could, in fact, be a plant superintendent, or a superintendent of the water or sewer department. If anyone in the organization reports to you and if you in turn report to someone above you, you are a middle manager. It would make sense for you to take this course if you ever expect to assume management responsibilities for your present employer or for a future employer.

The supervisor is many things to many people.

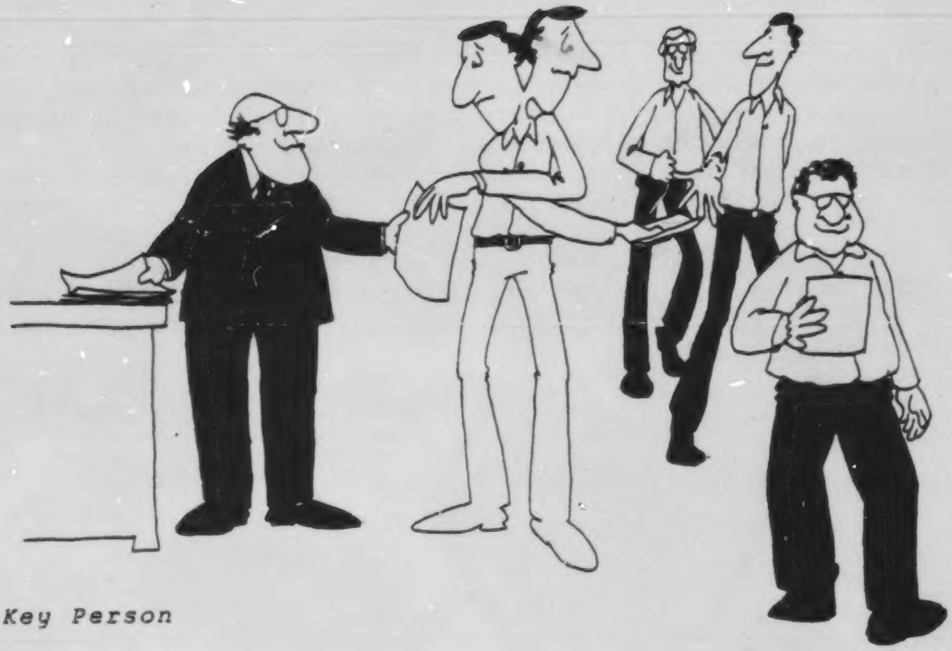
THE SUPERVISOR, *



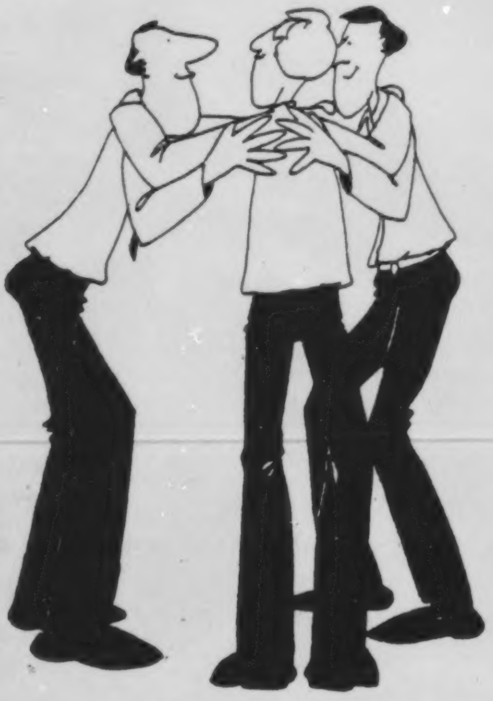
The Person-in-the-Middle



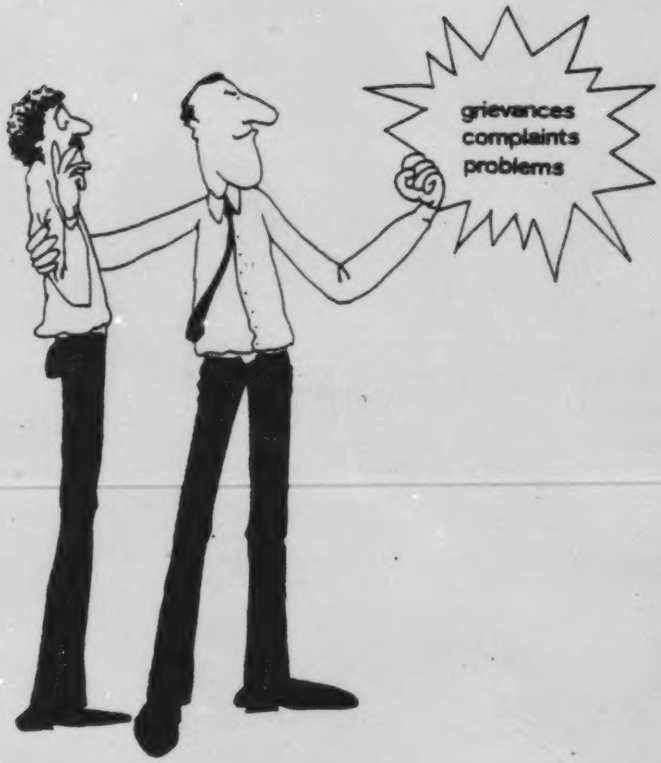
A demanding taskmaster



The Key Person



A Fellow Worker


grievances
complaints
problems

A human relations specialist who solves operating problems

*From Keith Davis, as cited by Leonard Kazmier, Principles of Management, 3rd Ed., (New York, McGraw and Hill Book Company, 1974). p. 271.

Regardless of the size or organization of your utility, basic management principles are IMPORTANT for you to know. If your utility is small, then practicing the principles of good management will enable you to accomplish the variety of tasks for which you are responsible. If your utility is large, then the application of management principles is essential since you must operate efficiently within the large and often complex system.

This course is designed to acquaint you with these management principles, especially as they apply to the water/wastewater field. Follow the directions, study the textbook and the manual, and use the review quizzes to help you chart your progress.

HOW TO ATTACK THESE LESSONS

1. You're busy. You know that and we know that. But to take this course, you will have to make some time available for study.

2. Each lesson is designed to take several hours of your time. It is recommended that you set aside a certain period of time to work on these lessons--possibly one evening a week.

3. Each lesson will refer to the textbook, Supervision: Concepts and Practices of Management, by Haimann and Hilgert. This text will give you a general overview of management principles.

4. This student manual will provide you with both study aids and practical application of lesson material. Each lesson will be arranged as follows:

    a. The title page, with an opening quotation appropriate to the lesson content, often by someone in the water/wastewater industry.

    b. A portion of the case example, which includes an incident involving the specific aspects to be covered in the lesson.

    c. An overview of the lesson, including a list of special points in the lesson which you should know by the time you have studied the lesson. This is entitled Questions to Ask Yourself: Do You Know...

    d. A section discussing some of the key points and the application of this information to the water/wastewater field. The reading assignments are located in this part. This portion is called Key Points.

    e. A concluding Review of the lesson, and Future References to enable you to pursue the lesson material further. These outside readings will often be excerpts from journals and magazines with material directly applicable to your area of work. They should be available at your place of work or local library if you do not have a personal subscription to these periodicals.

    f. A Mini-Review Quiz which you may take as a practice quiz or use as a review sheet. The answers are provided so you can check your progress.

    g. The Objective Test and a Subjective Portion covering the lesson. You need to send in both parts to be corrected and graded. Notice that you only need to send in the answer sheets, not the test questions. This way, you will have a copy of your tests in your manual. Your answer sheets will be graded and scored and sent back to you.

5. We suggest you follow these steps completing these lessons:
    a. Read the materials in the order suggested.
    b. Complete the practice tests.
    c. When you feel prepared, take the Objective Test, and complete the problem application in the Subjective Portion.
    d. Send this test and problem statement back to:

        Self-Study Course Coordinator
        c/o Office of Director of Executive Programs
        432 Eppley Center
        Michigan State University
        East Lansing, MI 48824

    e. You will receive your score promptly and also the answers to any questions you might have asked. You should be working on the next lesson by this time.

6. That's all. Hopefully, you will get a maximum amount of information with a reasonable amount of effort.

7. When you have completed all parts of all seven lessons successfully, you will receive a Certificate of Completion from Michigan State University and six Continuing Education Units which will be permanently recorded with the M.S.U. Office of Continuing Education.
    a. A score of 11 or more correct answers are required (out of a total of 15) on each Objective Test to be considered a passing score. If you miss 5 or more on any test, all is NOT lost, because we will send your test back to you with an opportunity to retake the test and try again for a better score. Remember, we are not out to flunk you---we are out to acquaint you with some managerial ideas.
    b. Each subjective portion will be marked with the grade of Superior, Satisfactory or Not Satisfactory. All unacceptable portions must be resubmitted to receive credit for completion of the course.
    c. A satisfactory evaluation of each Subjective portion means that each part of each Subjective portion must be deemed acceptable. If you do a superlative job on one part of one lesson, this does not mean that you can ease off on the next part.

LESSON ONE

INTRODUCTION TO MANAGEMENT

Section 1: The Importance of Being a Manager

Assigned Text Reading: Chapter 1

Section 2: The Functions of a Manager

Assigned Text Reading: Chapter 2

What is a manager?..... To get maximum use for the reading ahead you should remember two distinct steps:

> First, keep in mind what you now do on your job as supervisor.
>
> Secondly, match your actual practices against some commonly accepted functions which managers perform for an organization.

To the extent that you can find some consistency between them you are managing. To the extent that you are omitting some of these functions you can identify some areas for developing your managerial skills.

Clark C. Caskey, "The Functions of Management," Journal, American Water Works Association, Vol. 64, No. 6, June 1972, p. 361.

INTRODUCTION TO THE CASE EXAMPLE THROUGHOUT THE LESSONS

The seven lessons in this manual contain an ongoing example of a utility system. This example is intended to be realistic, but is not an account of an actual utility. The middle manager involved in the River City utility system is Wilbur Wainwright, an experienced manager who has been called in to manage the utility in the face of unexpected difficulties.

We realize that many of the problems encountered by Mr. Wainwright are more drastic or severe than the difficulties that you have or (hopefully) will encounter in your positions. We have selected these particular problems because they illustrate certain principles in each lesson. Suprisingly, a number of students who have already taken the course have indicated that many of the problems described in the examples mirror difficulties which they have previously experienced.

Whether you find these examples realistic or extreme, we hope that they provide a learning situation which allows you to empathize and apply the lesson principles. If you are able to improve your managerial skills, then Wilbur Wainwright and the River City utility example will have served its purpose.

Any suggestions or comments which you have toward the improvement of this case study will certainly be appreciated. We want this ongoing example to reflect the difficulties which face the middle manager in the water or wastewater field. Your interaction helps to make this example relevant.

We hope you find the saga of Wilbur Wainwright and the River City utility system interesting, fun, and meaningful.

LESSON ONE - SECTION 1

THE IMPORTANCE OF BEING A MANAGER

No one should ever have to step into a position in a water or a wastewater utility system on such sudden notice, you tell yourself. Yet here you, Wilbur Wainwright, are, on an overcast Labor Day holiday. You dig through the envelope containing the keys, trying to find the one that will unlock the main door. Not that you are a stranger to this plant in River City. Deephaven, where you have run the water treatment plant for the past seven years, is only 50 miles down the road. You have been here several times in the past year to visit Herb Carson, the assistant manager, and your former colleague. The shock of yesterday's phone call comes back to you as you finally locate the right key, and the door swings open. You walk toward the office section. You'd just been sitting down to breakfast with Bessy when the General Manager here, Jack Watson, had called you up, desperately. Although usually calm, Jack had not been too coherent, but you caught the gist of the message. Herb and two other fellows had just been killed driving home from the state association meeting.

Herb had been so proud of his new car, you recall. He'd talked about getting a new one for years, and had finally managed to swing it. Now here was Jack, telling you that Herb had just been killed, as well as the two other fellows in the car, Herb's assistants here at the utility. One had been Jim Smith, head of the Engineering and Maintenance Departments, the fellow who usually took over for Herb. The other had been Pete Swenson, head of General Services and Personnel. Pete had come to River City fairly recently, but you remembered Herb already praising his work and accomplishments.

It was fortunate that you had total confidence in your assistant back in Deephaven while you pull things together here in River City. A shiver passes over you as you push open the door to Herb's office, but you grit your teeth and resolve to put your feelings and sympathy behind you, at least for the moment. River City, this community of over 175,000, needs a well-functioning water and wastewater utility system, and the General Manager, Jack Watson, had given you the responsibility of seeing that operations did not break down until a permanent replacement had been hired.

Amazing, you muse, as you pull up a chair to Herb's desk. You'd been here, even in this very office so many times before, yet now everything looks totally foreign and strange. You cannot even remember the name of his secretary. Oh yes, it is Mildred. Mildred Erickson. She'd been here a long time. Mother Mildred, Herb used to call her.

Who else do you know here? Let's see. Well, there's old John Whipple. John had been the chief operator here for as long as you can remember (which is not overly long, you remind yourself), but John has probably been here since the plant first had been built back in 1954. Oh yes, Douglas something or other. You start shuffling through the center desk drawer in the desk, looking for a personnel roster. Finally you pull out a sheet of paper with names and addresses on it. Douglas, yes, here it is, Doug Court, in the laboratory and research area. Glancing down the list, you decide that first thing tomorrow morning you will hold a meeting in this office to meet the staff and keep operations in motion.

You look at the stack of letters and memos on Herb's desk. Either Herb received a lot more mail than you did, or he let it stack up for quite a while before getting around to it. You wonder how long you'll be involved here in River City. Watson had not sounded too optimistic about locating an early replacement, although one never knows. Anyway, he had been pretty sure that it would be three to five months. Well, you figure that will be more than enough time to really get things organized here. You reach for the stack of mail. Looking around the office, you reflect on the changes that have come about since you got into the water utility area, what is it, 17 years ago now? You have learned a lot in those past years--but a lot of changes have taken place too. You have had experiences on the job, and you have spent a lot of tiring evenings sitting in night school picking up some training both in operations and in management. But it was worth it, you decide. You had been able to organize the work at the utility in Deephaven far better in these past few years--and the employees seemed much happier on the job, too. You even remember the day when you suddenly realized that even though the purpose of the water utility plant there was to provide the Deephaven community with adequate and safe water, your job had become much more of a people job than a water job. Well, you hope you can put some of those same ideas to work here in River City.

* * * * *

This scenario opens our discussion of management techniques in the water and wastewater field. The first section of Lesson One sets the stage by looking at some of the changes and trends which form the basis for the water/wastewater utility industry today. It also presents the focus for this course--people management. Go on to the next pages, read over the "Questions to Ask Yourself" section, page 9, as a starter, then cover the Assigned Reading portion in your text and come back to the manual.

THE IMPORTANCE OF BEING A MANAGER

The opening chapter of the textbook is an important one, so read it carefully. It will provide an overview of the information to be presented in the course. Many of the concepts presented in this first chapter will be expanded in later sections.

Before you begin the assigned reading, look over the following outline:

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Trends of Concern to the Supervisor?

- The expected growth of the labor force in the coming years as new and larger water and wastewater systems become operational? Will automation and instrumentation, the union, rules and regulations have an effect on your staff?

- That the composition of the labor force is changing, especially as to age and minority involvement as younger people, women, and other minority groups become employed at water and wastewater systems? Will policy and procedural changes be required to accomodate the changing labor force?

- The occupational trends that are forecast--but also realize that these forecasts can be mistaken? What about job categories in the utility? Will different types of employees be needed to operate and maintain newer types of equipment?

- The working conditions that are expected to change, including more fringe benefits, safer work environment, more plant automation, shorter work week?

The Relationship between Change and the Supervisor?

- Why the water and wastewater system supervisor should be most aware of the changes taking place?

The Aspects of People Management?

- The different types of values and attitudes within the work force?

- That management has developed more flexible policies today due to the variety of employee attitudes toward behavior and authority?

- That there is an amount of increased employee participation in decision making?
- That employee upgrading today is more important than ever before?
- The ways to encourage motivation, over and above that of wages and fringe benefits?

How to Provide Leadership as a Supervisor?

- The situations where leadership may be illustrated?
- The traits of leadership?

The Relationship between the Group and the Supervisor?

- The dynamic process taking place between the leader and the group as well as the situations confronting the leader?

What Professional Attitudes Should be Held by the Supervisor?

- The aspects of self-improvement which the supervisor must follow?

* * * * * * * *

Now - plunge in and read Chapter One in your text.

THE IMPORTANCE OF BEING A MANAGER

Assigned Text Reading:
Chapter 1, Modern Supervisory Management

This is a course on Management—not Operation. As such, it probably differs in intent from other courses which you have taken. We are going to concentrate on the supervisory aspects in a water or wastewater utility system. Hopefully, you will focus on the supervisory and organizational rather than the technical aspects of your utility as you proceed through this course.

The supervisor is responsible for the PROPER UTILIZATION OF PEOPLE. If you remember that, and gear your operation so this is accomplished, you will be doing your job as a supervisor or manager. This is easier said than done and provides the reason for the creation of this course.

The opening chapter in the textbook provides you with an overview of what is to follow, in part, throughout the course. In addition, it provides a brief background of the labor situation today, both in terms of people and technology. It stresses the leadership traits which aid the supervisor in dealing with employees, and points out the characteristics which all managers should possess and practice.

KEY POINTS

First, You've Got to Know the Territory

Here you are, ready to dive into the management principles which you are now primed for, and we give you list of trends instead. But these facts and figures are important. Why? Because they lay out the surroundings in which you, as a manager in a water or wastewater utility, will have to work. Knowledge of the overall situation allows you to gear up for expected trends and plan for them.

Trends in Terms of *Numbers*

The population in the United States is expected to increase to be just under 300 million by the year 2000. In addition to the implications for the labor force, this also means that new and more complex water and wastewater utility systems will be required to handle the needs of that expanding population. A national survey conducted by the EPA in 1975 found that there were more than 58,430 water pollution control plants alone in the U.S.A. Since there appear to be an average of three operators per utility, this means that there were more than 175,000 operators in the U.S.A. in 1975.* Combined with the water treatment plants, this brings the number of utilities across the U.S.A. well over the 100,000 mark. Since each utility has at least one manager, and often several middle managers, the number of employees in the water and wastewater fields who will be able to utilize managerial training is also well over 100,000. Many are relatively young middle managers.

The generation gap is a factor worth noting. It is a mistake, however, to immediately lump all younger employees into one attitude or value class, and all older employees into another category. Often this gap can exist between two employees of the same age. There is no question that younger people have been attracted to work in all aspects of the environment. This is due to the publicity resulting from such things as construction grants, environmental assessment studies, and water resource preservation programs. The supervisor should take as objective a look as possible at the rules and regulations. Does long hair, for example, really constitute a safety hazard or cause a disrespectful employee attitude, or is the concern over long hair just a personal bias? Depending on the situation, any of the above could be true and it is often up to the supervisor to determine the real, underlying reason for certain regulations. That reason should be aimed at pleasing employees while aiding productivity output.

---

*Vonic, M., "We Need Trained Operators--Now!", Water & Wastes Engineering, December 1976, p. 51.

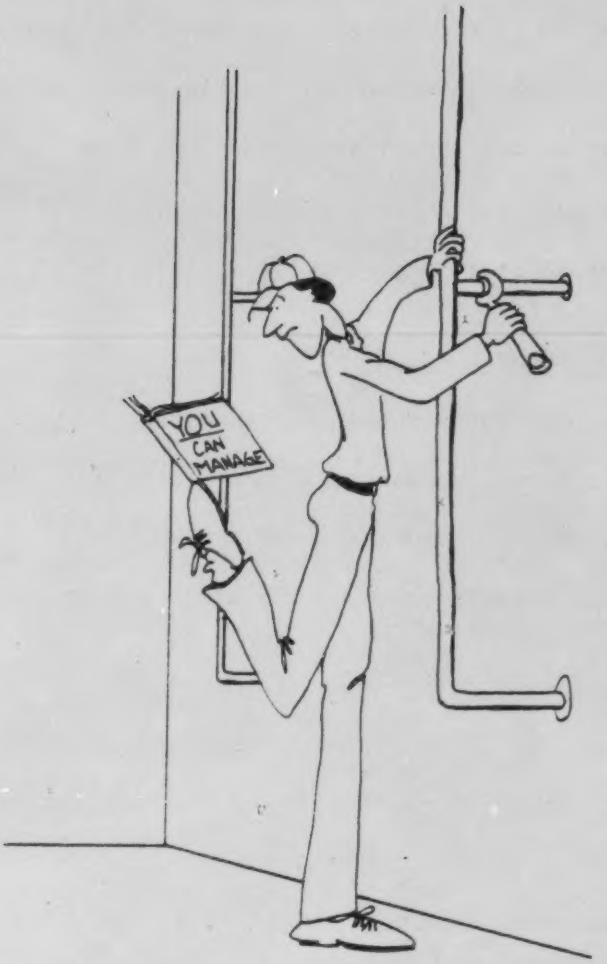
Trends in Terms of *Minorities*

Not only does the work force appear to be getting younger, but the composition of the force is changing. The emphasis on minorities is finally showing results. Minorities are not only entering the work force in increasing proportions, but are also assuming positions of responsibility.

Women occupy a very small proportion of management positions in the water/wastewater field. Yet even here, increasing numbers of women are being employed in utility systems and are doing excellent work. Several women, in fact, completed the first edition of this course with highly commendable performances.

Trends in Terms of *Upgrading*

More and more emphasis is being placed on in-service training. This is usually done through on-th-job training, short courses, seminars or correspondence courses which require little time away from the work place. Indeed, by taking this course you are involved in a form of self-improvement. Part of your responsibility as a supervisor in a utility system will be to train your subordinates so that when you are promoted, or change positions, there will be a suitable person to step into your place. You should not only master these managerial skills, but also pass them on to other employees.



More and more emphasis is being placed on in-service training, usually through on-the-job training.

Trends in *Technology*

Management and engineering techniques used in other fields are being applied to water and waste treatment. These techniques, like the Critical Path Method (CPM) and Program Evaluation Review Technique (PERT) developed in the 1960s, can assist in plant physical planning, financial planning, budgeting, and overall management control.

Industrial engineering techniques are being applied in the planning, design, maintenance, operation, and management of water and wastewater treatment systems. These approaches can provide a basis for the development of better operating procedures, operations manuals, training aids, and work standards. They can also provide the basis for developing preventive maintenance work schedules. In addition, utilization of such techniques can provide the basis for determining and defining proper staffing and skill levels for water and wastewater systems. Other tactics such as questionnaires and surveys can be useful to identify and improve public relations and employee morale. Management by Objectives (MBO) can be utilized to help individuals set their own target standard of performance and later evaluate themselves compared to these standards. The supervisory audit can also assist the individual in a self-appraisal of performance.

The computer and related technology are having an increased impact on supervisory management. In the water and wastewater treatment industry, the utilization of computers for plant automation, management information systems, and other more routine data processing such as payroll, billing, etc., will increase with each year. Examples of the applications of computers include programming of pumping stations, plant operations, analysis of distribution flow problems, equipment, maintenance schedules, customer billing and service operations, and cost/budget reports.

Water meter reading is changing in some locations from the basement to indicators located outside the customer's building. Adaptors are available to record the reading on tape, making it unnecessary for the reader to write down any information.

There are several examples of highly automated treatment plants, a few of which are designed to be completely remotely operated. Certain functions are presently automated, such as changes in flow rates, chemical feed, quality control, filter backwashing, etc. Tomorrow will see plants operating under the direction of computers.

Motivation

This term alone should raise your interest, since this is one of the prime tasks and concerns of the supervisor. How often have you wished that employees would be on the job right on time instead of straggling in late? The text aptly notes that the traditional motivators of wages and fringe benefits are often out of the control of the supervisor. Instead, the supervisor must substitute less tangible but still highly important forms of motivation. Amazingly, it has been found that employees favor such rewards as recognition or personal consideration over some of the more tangible ones.

Employee Values and Expectations

The employee-employer relationship has changed significantly over the past two centuries. Prior to the American industrial revolution, which introduced the mass production of such items as automobiles, there was not much consideration for human relations by management. The worker was dominated by his superiors and received only subsistence instead of wages. In the early part of the twentieth century, a more scientific approach to business management began developing. The average worker during this period received a wage but was essentially considered a production unit. From the Great Depression to the 1950's, human relations in organization gradually received more and more attention from management. The considerations of the individual thus became as important as the considerations for occupational problems.

Today employees are sophisticated and are concerned with various benefits in addition to wages. Water and wastewater system employees are also gaining increased stature and recognition in their communities, due to the high level of construction in recent years.

The Group

The supervisor does not operate in a vacuum. Often in the utility, at the treatment plant, in the business office, or with work crews, the supervisor is alongside the operators and other workers much of the time. Group interaction is essential for the supervisor--and communication plays the major role in this interaction. Decision-making and task delegation are participative situations between the superintendent of the treatment plant and the shift operators today, and the supervisor must know how to operate within this situation.

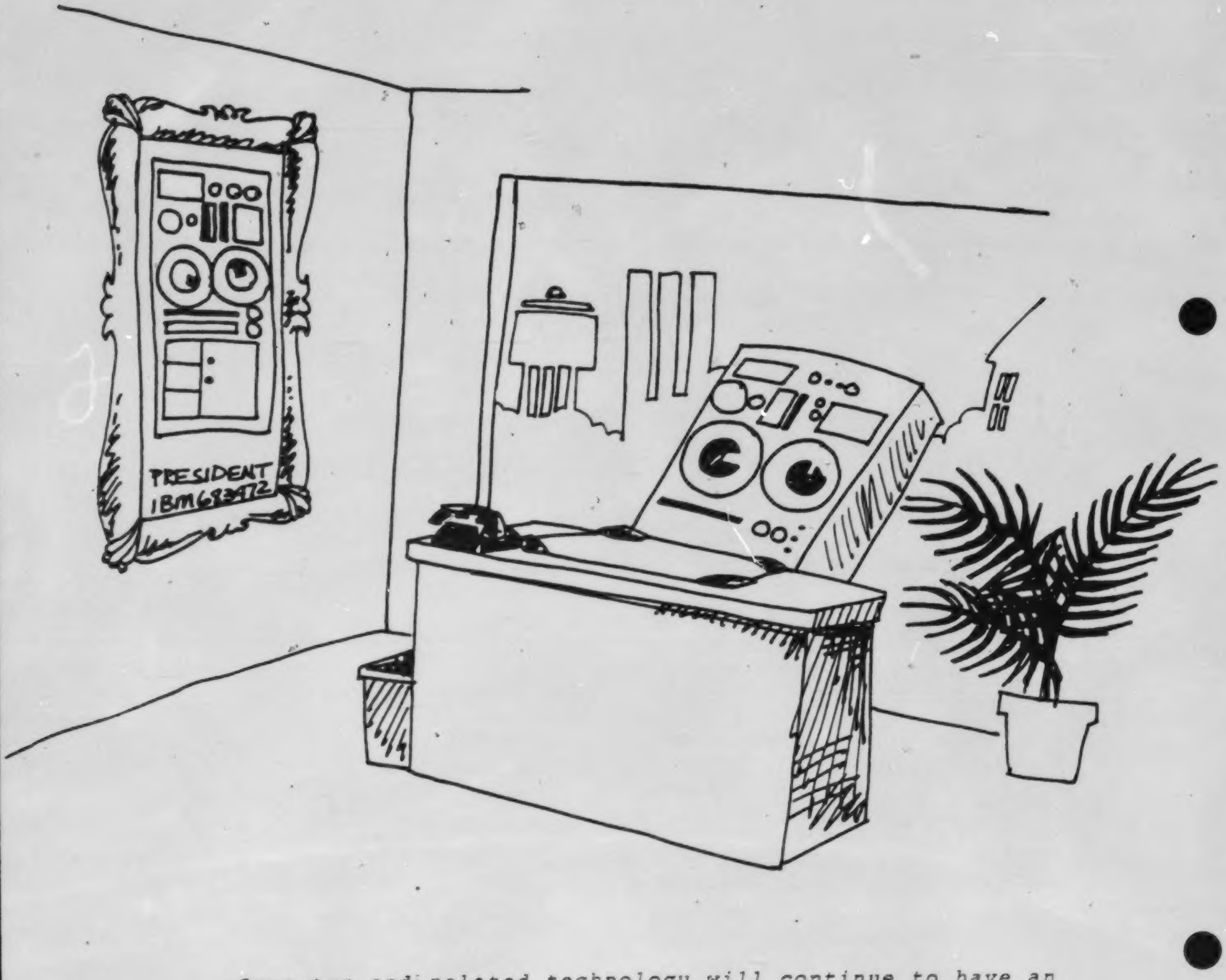
Managers; Born or Made?

Many people have grown up believing that either they were born leaders or they were not. Unfortunately, this belief has probably stifled a few leaders. Furthermore, many people seem to see leadership roles only in terms of presidential offices or similar situations--and do not realize that they are often leaders in an informal sense on a day-to-day basis.

Perhaps the most common mistake made by many would-be crew chiefs and plant superintendents is the tendency to "do the job yourself." Yet, that is exactly what the good manager is NOT supposed to do. The person who believes that something will not be done correctly unless he does it himself will probably never be a good supervisor. The job of the manager is to *plan, guide,* and *supervise.*

The Professional Supervisor

All persons in managerial positions should consider themselves professional supervisors, and respond accordingly. This means being aware of the trends and changes taking place--or those about to occur, and being prepared for them. It means continuous self-improvement and renewal.



Computer and related technology will continue to have an increasing impact on supervisory management.

REVIEW

Look over the beginning of "Questions to Ask Yourself" to see if you are able to respond to these questions now. It is likely that you may be able to recognize opportunities to improve relationships between you and your superior, or between you and staff working under you. Use the opportunities to liberalize your approach toward social and training problems. Spread your knowledge. Encourage your associates to undertake self-improvement programs.

FUTURE REFERENCE

Hadeed, S. J., "Enrollment Trends in Environmental Programs", Journal, Water Pollution Control Federation, Volume 48, No. 7, July 1976, pp. 1690-1692.

The "far-reaching danger of manpower shortages" is stressed, utilizing a quote from Dr. E. J. Middlebrooks that "shortages are sure to bring unqualified people into the field and place them in positions that they are incapable of handling". This should certainly inspire all managers to spruce up their capabilities as trainers.

Jorling, Tom, "A Sign of Things to Come at EPA", Journal, Water Pollution Control Federation, Volume 49, No. 8, August 1977, pp. 1753-1757.

Tom Jorling is the new Assistant Administrator for Water and Hazardous Materials for the EPA. In this interview, he points out the urgency involved with updating wastewater treatment methods and urges the attainment of a broader outlook.

Middlebrooks, E. Joe, J. H. Reynolds, C. H. Middlebrooks, Joseph Banhick, and Robert F. Ruhl, "Manpower Needs of Local and State Agencies", Journal, Water Pollution Control Federation, Volume 49, No. 8, August 1977, pp. 1786-1810.

"If state and local governments are to assume the role and accomplish the goal established for them by PL 92-500, it is essential that well trained and qualified personnel by available to these agencies." Thus opens a well documented and comprehensive article on the needs which exist or are projected to exist throughout the wastewater treatment field.

Piecuch, Peter J., "Facing Up to the Management Problem", Journal, Water Pollution Control Federation, Volume 49, No. 5, May 1977, p. 725.

Editor of the WPCF Journal, Peter Piecuch reports that "there is no doubt that the commitment to effective wastewater treatment plan management exists within the Federation, and that it will be discussed with increasing frequency in the months ahead."

Ring, C. A. III, "President's Message", Journal, American Water Works Association, Volume 69, No. 1, January 1977, p. 1.

AWWA President Ring provides an overview of the responsibilities of the Association for the future--emphasizing such objectives as educating the industry, concerned public officials, and the public in general.

Wagner, V. G., "Building New Programs on Old Foundations", Journal, Water Pollution Control Federation, Volume 48, No. 9, September 1976, pp. 2098-2106.

Victor G. Wagner was the WPCF president for the 1975-1976 period. Among the upcoming programs noted in his article are the managerial concerns of safety and costs. Additional training of managers in supervisory skills is viewed as one way to upgrade safety and clamp down on increasing costs in wastewater utilities.

MINI REVIEW: SECTION 1

Do not send in....(check your answers with those at the bottom of the page)

______1. What is the most important and all-inclusive aspect of supervision?

a. proper utilization of finances
b. proper utilization of people
c. proper utilization of equipment
d. general utilization of all resources

______2. One major implication of the increasing size of the labor force under 25 years of age is that supervisors must deal with the "generation gap" of different attitudes and ideas.

a. True
b. False

______3. Supervisors will have to deal only with educated workers in the future.

a. True
b. False

______4. The supervisor or middle manager has the most control over which type of motivation?

a. wages
b. fringe benefits
c. working conditions
d. employee sense of achievement

______5. Leadership occurs as a result of

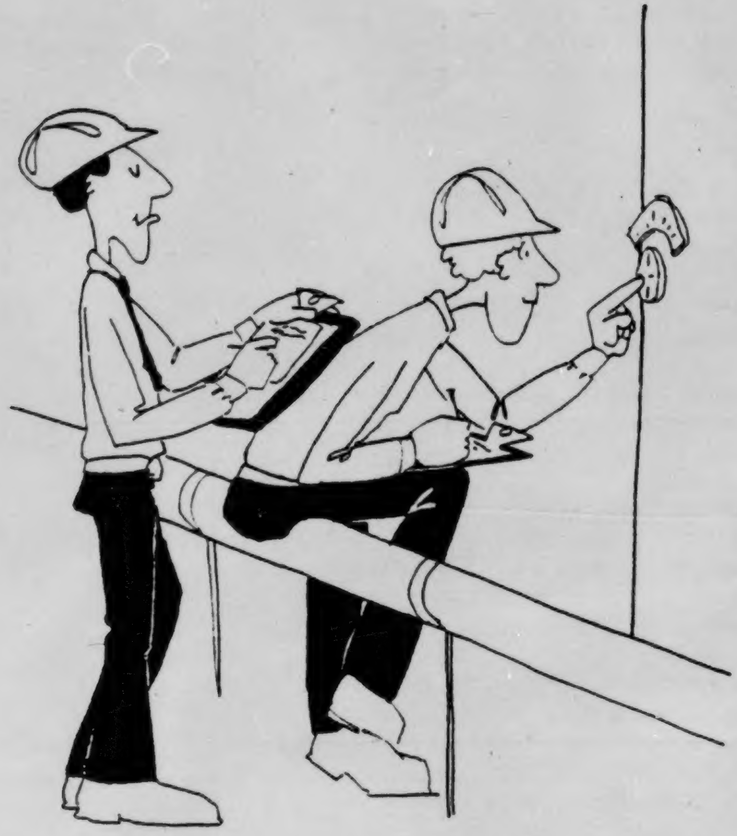
a. supervisory authority and position
b. being born with certain traits
c. the supervisor's ability to achieve employee willingness to follow
d. the number of years on the job

* * * * * *

How did you do? Perfect score, hopefully? Be sure to review the material for any questions you may have missed. When you feel comfortable with this section, go right on to the second section of this first lesson...

Onward, ever onward...

ANSWERS: 1) b 2) a 3) b 4) d 5) c



Shift supervisor

LESSON ONE - SECTION 2

FUNCTIONS OF A MANAGER

Wilbur Wainwright shook himself out of his reverie about his progress in the past with a start. He had a job to do here--and quite a job it was. Right now, he was out to learn as much as he could about the utility here at River City before people started coming to him for advice. He placed the Personnel Roster at the side of his desk and pulled the stack of mail closer to him. He wanted to get an idea of what types of problems he'd be in for. Wilbur just hoped that the assistants formerly under Smith and Swenson were capable employees. If not, he'd try to bring over some of his own crew from Deephaven to make it through the first couple of weeks.

As Wilbur started shuffling through the memos and mail, his eyes widened. River City might have a big, modern plant with a goodly number of employees, but something was definitely lacking. All these memos and letters were in a box labeled "needs attention", but these affairs should never have been allowed to become so backlogged. It looked as if things were not running smoothly here. He'd never seen such a welter of complaints and problems at one time in his former position at Deephaven. Well, nothing to do but plunge in. He would now be able to put to good use the principles and techniques learned during attendance at the American Water Works Association Institute for Water and Wastewater Utility Management. The River City utility employees were probably capable enough, but they really needed some direction and motivation to increase their productivity.

(EXHIBIT 1)

RIVER CITY WATER/WASTEWATER UTILITY PLANT

Employee Christmas Address List

	Name	Address	Phone
	General Manager		
	Jack Watson	2200 West River Drive	349-0021
	Secretary: Jeanette Glover	2380 Gates Street	349-5343
	⋮		
	Assistant Manager		
(gone)	Herbert Carson	1895 Horton Place	349-4530
	Secretary: Mildred Erickson	2456 Beach Road	349-5788
	⋮		
	Maintenance and Engineering		
(gone)	Head: Jim Smith	Rt. 3, Box 517	381-3566
	Asst: Hal Jones	231 Benning Road	349-9854
	⋮		
	Accounting and Finance		
	Head: John Day	6887 Pleasant Street	349-8070
	⋮		
	General Services and Personnel		
(gone)	Head: Peter Swenson	4650 West River Drive	349-5569
	Asst: Jim Johnson	2900 Hardlyborn Street	349-5429
	Secretary: Bertha Hornblower	2121 Eaton Street	349-4670
	⋮		
	Research and Laboratory		
	Head: Douglas Court	4900 President Street	349-7822
	⋮		
	Operators		
	Chief Operator: John Whipple	Rt. 3, Box 482	381-7762
	Gary Plaugh	2203 Forsythe Street	349-5413
	Ron Appleton	Rt. 3, Box 980	381-2166
	⋮		

(EXHIBIT 2)

RIVER CITY WATER AND WASTEWATER UTILITY

Box 4300
2902 West River Drive
River City, Michigan 44228
(809) 349-3220

MEMORANDUM

TO: Herb Carson, Assistant Manager

DATE: August 2

FROM: Jack Watson, General Manager

SUBJECT: Tardiness - Treatment Plant

Please check with the operators at the treatment plant about late arrivals by the afternoon shift. The time cards all indicate these people are arriving on the job 10 to 15 minutes late every day.

I understand they all live in one area and are sharing the ride, so when one is late they are all late. A discussion with them might lead to a need to change the shift starting time, earlier or later, to avoid a traffic problem.

I'm sure this is a minor problem, but if we tackle it now, it will improve the morale of the morning shift, who could be entitled to overtime, and we do not need that at this time. Please let me know the outcome of your discussion the end of the week.

JW:jg

(EXHIBIT 3)

RIVER CITY WATER AND WASTEWATER UTILITY

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Pete Swenson, General Services and Personnel

DATE: August 2

FROM: Jack Watson, General Manager

SUBJECT: Staffing - Electronic Equipment Maintenance

Confirming your telephone call this morning you are authorized to draft staffing and training recommendations for the electronic technicians at the plant. Please make this a priority because we will need the recommendations to consider this Thursday at the Board meeting.

This is an opportunity for us to use the new EPA manpower staffing guide, which as I recall, also contains typical job specifications. You might also be able to estimate what the difference in starting wages might be if we start with trained versus untrained people. We could train them in-house before next year, but it might not be worth it.

JW:jg

cc: Herb Carson

(EXHIBIT 4)

Hazel Weirton
104 Lombard Street
River City, MI 44228

July 24

Mr. Jack Watson, General Manager
River City Water and Wastewater Utility
Box 4300
2902 West River Drive
River City, Michigan 44228

Dear Mr. Watson:

I am writing this letter after being advised by your business office that it would be helpful to the Utility if I would put my complaint in writing. The problem is that we have low water pressure here in the Lombard section. I did not realize the problem was so widespread until a group of us were talking at the bridge club last week. I found then that neighbors who live two blocks from us have the same problem.

We all believe you and your staff are aware of the problem, but it is particularly severe during the morning. On Mondays my washing machine takes twice as long to fill as it should. This delays my schedule and it is frustrating. Perhaps the more disturbing part is when my husband is in the master bath shower and one of the children turns on the shower in their bath. This always happens when my husband is covered with soap and the shower flow drops to a trickle.

I'm certain if you check with a few of our neighbors they would agree that the water pressure is low and that something should be done, and soon, to improve it. I look forward to hearing from you.

Sincerely,

Hazel Weirton

Hazel Weirton

(EXHIBIT 5)

RIVER CITY WATER AND WASTEWATER UTILITY

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Jim Smith, Maintenance and Engineering

DATE: August 2

FROM: Jack Watson, General Manager

SUBJECT: Low Pressure - Lombard Section - Customer Complaint

Here is another low pressure complaint from the west side. I'm glad the Board approved the budget item for the new pumping station out there. Would you please fill me in on the status of this project?

Please let me have your report so I can respond promptly to Mrs. Weirton. We will also prepare a press release on the subject. That may reduce the flow of complaints for the time being.

Also, I suggest that you send a crew out to be certain that all of the valves are open in the mains serving the Lombard section. I'm certain they are, but it might help our customer relations program if they see our truck and crew doing something in the area.

JW:jg

cc: Herb Carson

(EXHIBIT 6)

RIVER CITY WATER AND WASTEWATER UTILITY

Box 4300
2902 West River Drive
River City, Michigan 44228
(809) 349-3220

MEMORANDUM

TO: Jack Watson, General Manager DATE: August 3

FROM: Jim Smith, Maintenance and Engineering

SUBJECT: Low Pressure - Lombard Section - Equipment Evaluation

This refers to your August 2, memo on this subject. The Lombard pump station design is complete as you know and we have received six bids. The contractor's submittals are being evaluated by the consultants right now and we should be able to recommend the first and second firms for consideration by the Board at Thursday's meeting.

According to the quotations and the range of completion dates from the contractors, we should have this station completed and on the line by next summer. This is in line with the planning schedule established last year.

Our crew re-checked the Lombard section again and found nothing out of order. Pressures were checked at six hydrants this morning and they ranged from 40 to 48 psi. The new station will certainly solve this problem and pave the way for the new Lombard shopping center.

JS:ned

cc: Herb Carson

(EXHIBIT 7)

RIVER CITY WATER AND WASTEWATER UTILITY

Box 4300
2902 West River Drive
River City, Michigan 44228
(809) 349-3220

August 4

Mrs. Hazel Weirton
104 Lombard Street
River City, Michigan 44228

Dear Mrs. Weirton:

Thank you for your letter of July 24. I'm sorry the water pressure variations are causing problems for you and your neighbors. You may perhaps be aware that the Utility is about ready to commence construction on the Lombard Pump Station. We plan to submit our recommendations for a contractor to the Board this Thursday. We expect to complete this project next summer on schedule in time to cope with the usually higher summer demand.

I also dispatched a service crew to the Lombard area to check valve openings and see that they are all properly adjusted. Pressure was somewhat low this morning, as we expected, but the new station will solve that problem. In the meantime, we appreciate your patience and continued interest in our programs.

Sincerely,

RIVER CITY WATER AND WASTEWATER UTILITY

Jack Watson

Jack Watson, General Manager

JW:jg

cc: Herb Carson

(EXHIBIT 8)

RIVER CITY WATER AND WASTEWATER UTILITY

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Herb Carson, Assistant Manager   DATE: August 14

FROM: Jim Smith, Maintenance and Engineering

SUBJECT: Personnel Problem

An employee, Hal Jones, has returned to work recently after extended illness. He has no external physical disabilities, but appears to be very frail. He is often on sick leave.

Our work load in engineering and maintenance is very heavy and Hal is not able to carry his share. This places the burden directly on the other employees who are beginning to complain.

It is important that we resolve this problem this week.

JS:ned

cc: Pete Swenson, Personnel

(EXHIBIT 9)

RIVER CITY WATER AND WASTEWATER UTILITY PLANT

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Herb Carson - Assistant Manager

DATE: August 15

FROM: Pete Swenson - General Services and Personnel

SUBJECT: Absenteeism

According to my records absenteeism for all reasons, sick leave, personal time off, lateness, etc., has increased.

Let's discuss this problem at our next staff meeting.

PS:blh

(EXHIBIT 10)

RIVER CITY WATER AND WASTEWATER UTILITY PLANT

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Herb Carson - Assistant Manager

DATE: August 16

FROM: Jack Watson - General Manager

SUBJECT: Cost Reduction

The subject of cost reduction has probably never had more significance than it has right now. The pressures continue to build up throughout the city to reduce costs. We have to realize that everything we do affects the cost of running the utility. One sure way to hold costs down is to be constantly aware of the fact that every bit of labor, material, equipment, supplies, time, space, power, and other operating necessities has a direct dollar and cents value.

I would like you to recommend an approach and also areas in operations where cost reduction might be possible. Because of the budget meetings coming up, I would like to have your ideas within one week.

JW:jg

(EXHIBIT 11)

RIVER CITY WATER AND WASTEWATER UTILITY PLANT

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Herb Carson - Assistant Manager DATE: August 17

FROM: Jim Smith - Maintenance and Engineering

SUBJECT: Equipment and Parts Storage

The storage space for the increasing inventory of equipment, parts, and supplies for the plant will be inadequate soon. We should discuss increasing the space, especially since the spare parts for the new electronics and pump stations will add to our storage problems.

JS:ned

(EXHIBIT 12)

RIVER CITY WATER AND WASTEWATER UTILITY PLANT

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Pete Swenson - General Services and Personnel DATE: August 20

FROM: Ron Appleton - Operator

SUBJECT: Overtime Authorization

I operate the wet air oxidation process that is a continuous operation. I should be paid overtime as long as the equipment is running. This includes my lunch break because I am responsible for operation then also. My supervisor does not think I am entitled to overtime pay, but suggests I talk to you.

Could we meet soon to discuss my request?

cc: Herb Carson

(EXHIBIT 13)

RIVER CITY WATER AND WASTEWATER UTILITY PLANT

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: Pete Swenson - General Services and Personnel DATE: August 21

FROM: Gary Plaugh - Operator

SUBJECT: Overtime Authorization

My supervisor does not think I should be paid overtime for operating the vacuum filtration process. I am responsible for the equipment through my lunch hour and should be paid for the extra hour.

I want to talk to you about my overtime request right away!

cc: Herb Carson

(EXHIBIT 14)

RIVER CITY WATER AND WASTEWATER UTILITY PLANT

Box 4300
2902 West River Drive
River City, Michigan 44228
(809) 349-3220

MEMORANDUM

TO: Jack Watson DATE: August 24

FROM: Jim Smith

SUBJECT: Problem with a supervisor and the operators

I have a real tough supervisory problem which began six months ago. One of my supervisors, John Whipple, refuses to delegate any real responsibility to his men. These men have complained and two of the best have threatened to quit. I have talked with the supervisor several times, but he still does not seem to be willing to give his men any responsibility or to let them make any decisions. He just does not seem to trust them to perform tasks and to report back to him with the results.

It will probably be necessary to take stronger action with him. I don't want to fire the supervisor unless it is absolutely necessary because his work and loyalty have been excellent throughout a long employment history. However, somehow we have to convince him that he must learn to delegate and that he has capable subordinates.

JS:ned

(EXHIBIT 15)

RIVER CITY WATER AND WASTEWATER UTILITY PLANT

Box 4300
2902 West River Drive
River City, Michigan 44228

(809) 349-3220

MEMORANDUM

TO: STAFF

DATE: August 25

FROM: Jack Watson - General Manager

SUBJECT: Lack of control over supplies

A review of the records over the past several months indicates that there is a lack of control over supplies, tools, materials, and equipment. The cost due to damage, loss, pilferage, etc., I think is excessive given the need to reduce costs.

Please let me know how you plan to correct this situation.

JW:jg

* * * * * * * *

The preceding pages are samples of the letters and memos which Wilbur found facing him. After you have read these letters and memos, go on to the "Questions to Ask Yourself" part, page 43, and then turn to the assigned reading in the text. As you read the material, think about the problems confronting Wilbur in managerial terms. This description might be as general as "this is a staffing problem" or as specific as eg "he certainly has a delegation of authority problem here".

THE FUNCTIONS OF A MANAGER

You are going to hear a great deal about the functions of a manager throughout this course, so we are not going to do more here than just present them. They are: *planning, organizing, staffing, directing, and controlling.*

What is meant by the word "function?" Functions can be viewed as the acts or operations expected of a person. For a manager, these acts are considered to be the five listed above. Sometimes the functions of a manager are listed as four or even three. This has not reduced the manager's role--the remaining functions are viewed as including the missing areas.

So, carry on. Read the outline, then the text, then the manual. As you do this, think about Wilbur Wainwright's problems at River City. How do they relate to the concept discussed in the text?

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Supervisor's Position?

- The place of the supervisory personnel within a water or wastewater utility organization?

The Ability of the Manager?

- The reasons why some persons in utility managerial positions do not perform as well as they might?
- The basic tasks which a treatment plant superintendent must be prepared to perform?

The Management Concept?

- What is meant by the term "management"?
- The five managerial functions?
- The reasons why the supervisor MUST possess the appropriate skills for the position?

Managerial Skills of the Supervisor?

- The reasons why supervisors should develop managerial skills?
- The two components of the managerial position?

The Managerial Functions?

- What is included in each of the five managerial functions?
- Why these functions are listed in the order that they are?
- The reasons causing the circular concept of these functions?

The Supervisor and Authority?

- Why authority is essential to the manager, and the ways to properly use that authority?

The Supervisor and Coordination?

- The means for attaining coordination?

* * * * * * * *

Have an idea of what's coming? Turn to Chapter 2 in your text on the Supervisor's Managerial Functions and read it now. Then continue reading in the manual.

THE FUNCTIONS OF A MANAGER

Assigned Text Reading:

Chapter 2, The Supervisor's Managerial Functions

The supervisor is the link, as the textbook points out, between the employees and the upper management. Remember, in this course we are considering all supervisory roles to be in the general middle management area, although the text does make the distinction between the middle manager and the supervisor. We are more concerned with the supervisor as the person below the boss who is responsible for the workers below him or her. This includes business office managers, treatment plant superintendents, shift supervisors and collection/distribution system superintendents, for example.

In the first section, we talked about the supervisor as the person in the middle. It may be more catchy to say the "man" in the middle, but another point in section 1 was that women are increasing in the labor force, and the manager may be a woman.

KEY POINTS

Management, What is It?

Management, the text states, is "the function of getting things accomplished with and through people by guiding and motivating their efforts toward common objectives." This requires group action, whether your utility system includes two or 200 workers and supervisors.

Management Knowledge Versus Technical Knowledge

The emphasis on having others do the work under your direction does NOT mean that the supervisor need not have adequate technical competence. Hardly. The higher the degree of technical competency, the more the supervisor should be able to direct the tasks being performed under his management. But this does not necessarily mean that he or she should do those tasks.

Now, how do you spend most of your time on the job? Are you involved in technical work or supervisory work? Look at each statement in the list below and put a check in the most appropriate column. (Remember, this is the START of this course on managerial training. It is better to find out NOW where your weaker skills as a manager are than to just put down the answer or response you think is correct.)

	I would usually do this	I would NOT usually do this
1. You want a survey of the public opinion which exists regarding the utility, as well as knowledge of some of the customer complaints (and compliments). You have a capable employee who can conduct this survey and you lay out all the particulars on how the survey should be run.		
2. You show the newly hired operator how to complete all the necessary forms which the personnel office requires by going through all the questions.		
3. Instructions for operating that new generator are complicated, so you call a general meeting and go over the operation yourself.		

	I would usually do this	I would NOT usually do this
4. The deadline for the annual report is near, and some departments are not done, so you stay after hours and help them complete all the categories.		
5. One of your employees comes to you with a problem, and you give a thorough explanation of the solution. You do not ask his recommendation because this would take up valuable time--he came to you, didn't he?		
6. After personal interviews with your employees, you polish off the employee appraisal forms and forward them to the personnel office.		
7. Purchasing that new, larger generator is going to cost a bundle, and you get the opinions of the qualified employees on the situation.		
8. You look over the work roster and compare it to the jobs which need to be done. You see that you could really use another employee on the night shift.		
9. You decide to put up a bulletin board for employees to use for announcements and other news. As well, you want one section to be used for congratulatory items on your employees.		
10. You encourage your employees to obtain additional training by offering a tuition reimbursement on their completion of all relevant courses.		

Curious about your responses? Look at the first five statements. If you checked the column "I would usually do this" for any (or all) of those statements, you would be acting in a very technical fashion. That means that you would be DOING the job more than you would be supervising others in doing the job.

	I would usually do this
1.	✓
2.	✓
3.	✓
4.	✓
5.	✓

= indicates you are using your technical expertise in DOING the work, but this is NOT managing.

Now, the final five statements, numbers six through ten, relate more to supervisory or managerial skills. If you checked any (or all) of these statements under the "I would usually do this" you would be functioning as a manager.

	I would usually do this
6.	✓
7.	✓
8.	✓
9.	✓
10.	✓

= indicates you are using your skills as a manager

This is NOT to say that working in a technical fashion is wrong. Most managers must function both as technicians and as managers. BUT, it is important for your to realize just when you are managing and when you are not! And, if you are like many other middle managers, you are probably into the technician side more heavily than you realize--OR NEED TO BE.

There appears to be a common fallacy among managers, especially beginning ones, that if you do not work alongside in doing the task, your employees will think you are shirking on your share. Hence, they will not do their part. WRONG. As a manager, you have been selected because of your abilities to oversee the work. Supervising others does not mean that you just sit back and let the work go on without you. It includes numerous tasks carrying both responsibility and importance. This includes selecting the right people for the right tasks and organizing the work so that it is able to be done most efficiently and effectively. If you jump right back into the harness with the others, then someone else will have to take your place as manager or driver. Just as technical knowledge is not gained in a day, a week, a year, or even longer, managerial skills also take time and experience to develop. We do not expect you to instantly become the perfect manager--but we do hope you will see substantial improvement in your skills by the time you have completed Lesson Seven.

Why Managers Do Not Want to Manage

Nonsense, you say. Of course, I want to manage. (The past little exercise convinced you, did it?) OK. But look at some of the reasons why it is difficult (and will continue to be difficult for you) to use your managerial expertise rather than your technical expertise.

> You have probably worked your way up the ranks via your technical skills. It's hard to develop an entirely new approach now.
>
> Technical accomplishments are usually TANGIBLE, obvious, and something that you can take immediate satisfaction in accomplishing. Managerial accomplishments are performed through other people--so you virtually have to take pleasure in their accomplishments--and that is more difficult to see.

> This is particularly true in problem-solving situations--the technical solutions are usually apparent. The managerially-related problems with accompanying solutions are far more difficult to see, and often take longer.

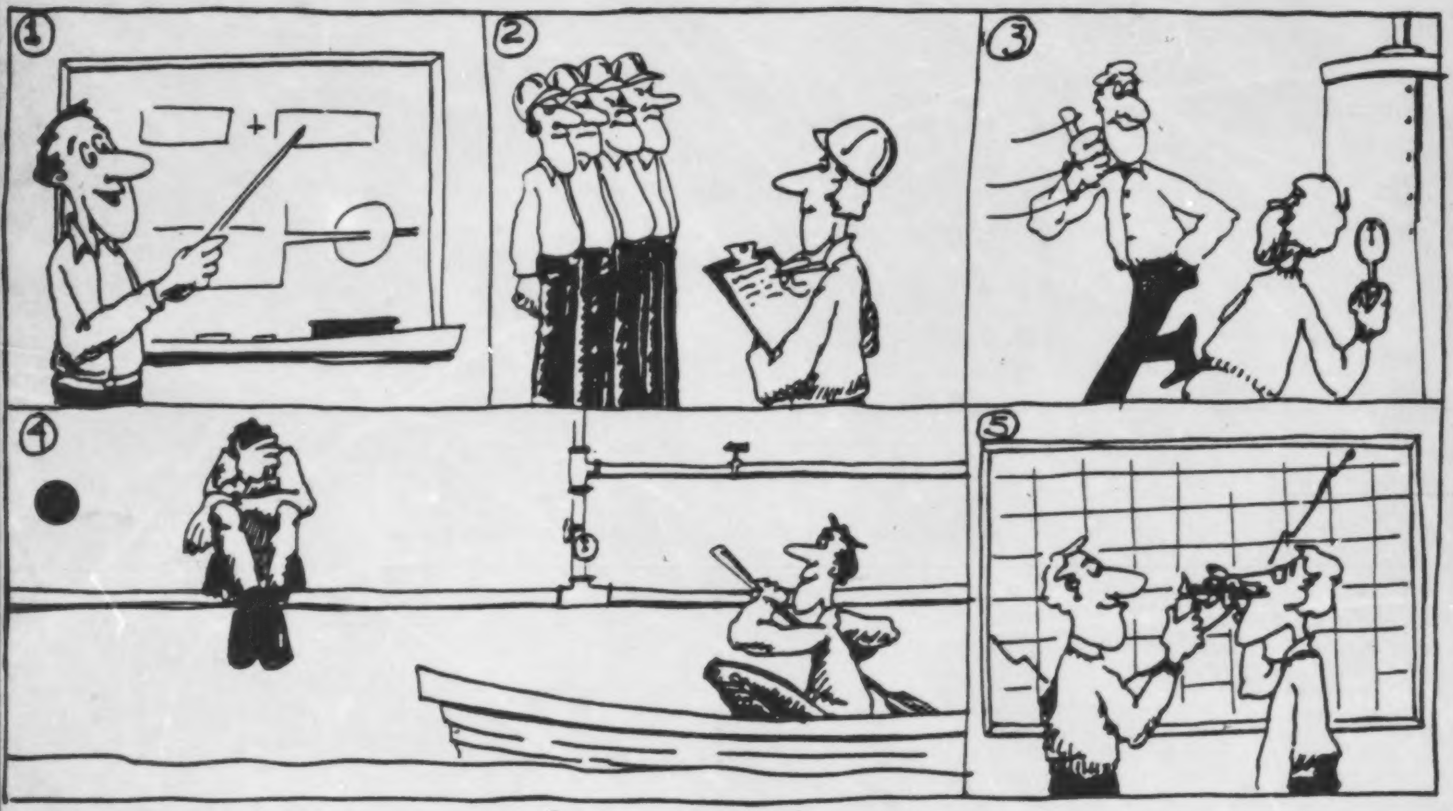
Can't My Technical Skill Ever Be Used Now?

You might suddenly be feeling as if you have ventured into foreign territory. This unknown land of management is not as much to your liking as you expected it to be. But, let us practice one aspect of being a manager of supervisor--getting a larger picture. What are some expectations of you--as a manager? Here are five points which you are usually expected to provide.

- Describe what is to be done--what is expected of the employees. This is where you must lay out the tasks and show how these tasks fit into the work of the utility as a whole. (It also helps a lot if you can show how these tasks HELP the employee!)
- Select the appropriate people to accomplish these tasks. (Remember, you are not DOING all the work yourself these days.)
- Let the employees know HOW they are doing on the tasks (especially when they are doing the tasks correctly). Keep high standards; don't allow exceptions; and try to catch mistakes while they are small (without, of course, standing over the employees' shoulders).
- Be ready to help when employees need it. This is where your expertise (and experience) are the MOST useful. BUT, be careful to not just jump in at the first signal --see if you are able to coach your employees into the correct response.
- Be ready with those rewards. Your employees have accomplished those tasks--and you should let them know they have performed correctly.

These are new job skills which you must develop and use as a manager. They utilize your past knowledge, and require some new skills as well. Hopefully, this managerial territory will turn out to be friendly after all.

YOUR TASKS AS A MANAGER



1. Describe what is to be done. 2. Select people to accomplish tasks.
3. Let employees know how they're doing. 4. Help when employees need it.
5. Be ready with rewards.

The Managerial Position--Two Requirements

Notice the two questions asked in the book concerning the true manager:

- Does he perform all of the managerial functions?
- Does he possess authority?

Both must be answered with a "yes" to be a true manager in word and deed. Take the first part--the managerial functions. These are (as you know by now) planning, organizing, staffing, directing, and controlling. You also may have gathered that different texts tend to have different lists, some with three functions, some with four, and others with all five. Regardless of the length of the list, the functions and activities are the same--and the difference lies not with the functions themselves, but where the management analyst tends to place the different functions. Take these functions step by step, as they relate to the water/wastewater field. In order for an organization to function effectively, someone must be in charge. Instructions must be given, procedures for carrying out instructions and implementing policies must be issued. The Manager must have the authority to do these things through his staff and associates.

The Managerial Functions

- Planning

  "Planning is the managerial function which consists of determining in advance what should be done." Planning in the water/wastewater field takes many forms--from deciding how many chemicals to order, to how to obtain additional revenue, expand service areas, conduct public information programs, or meet manpower requirements. The manager must decide what is going to be done, when the tasks will be undertaken, and when they are expected to be completed.

- Organizing

"Organizing means to answer the question, 'How will the work be divided and accomplished?'" It is usually within the organizing function that the supervisor must delegate authority. Organizing in the water/wastewater field includes setting up the various shifts of duty, and establishing engineering, operating, maintenance, accounting, personnel, clerical, and other activities.

- Staffing

"Staffing is the managerial function of recruiting new employees and determining whether there are enough qualified employees to fill the available positions." Note the word "qualified". This encompasses a variety of training situations. It also includes job specifications, evaluation procedures, promotion and replacement, often within certain professional registration and certification requirements.

- Directing

"The directing function includes guiding, teaching, motivating and supervising subordinates." The previous function touched upon the training of employees for particular jobs. This function tends to dwell on the preparation of employees to perform certain tasks while directing tends to encourage those same workers to perform those tasks better and more efficiently--

and to continue to do so, often within local, state, and federal limits. Among the challenges utilities face is to improve working conditions, build a better safety record, contribute to the public health and improve the environment.

- Controlling

"Controlling involves those activities that are necessary to make certain that objectives are achieved as planned." This brings us back to the original function of planning, and completes the circle. Controlling activities in the water/wastewater field include: direction and scope of utility system expansion, number of employees, inventory levels, employment of outside forces.

Managers must know the extent of their authority and use it properly.

The Extent of Authority

A manager without authority is not a manager, and he cannot function as one. However, this is not to say that the manager should wear his authority like a badge. That old saying of "speak softly but carry a big stick" still applies. Many problems could be avoided if would-be managers know the extent of their authority and use it appropriately.

Coordination or Cooperation?

Note the difference in the text between coordination and cooperation. All the cooperation in the world is not sufficient if coordination is not present. If the five managerial functions are to flow smoothly, there must be coordination among them. If plans are not made and implemented, then the controlling function can hardly be expected to insure that plans are carried out. Regularly held staff meetings are one means of coordinating the efforts of the departments or operating units in a utility. Department heads and supervisors can review progress of budgetary expenses, project progress, and other similar items.

REVIEW

This section may be summed up with a few short words--planning, organizing, staffing, directing and controlling--but do not let the brevity mislead you. This chapter really provides an overview of the manager's basic responsibilities. Wilbur is going to have to perform these functions if he hopes to efficiently accomplish the tasks ahead of him.

Remember, the manager's prime task is to manage. You may have been promoted to your position through being the best operator in the plant--which indicates that you have the necessary technical skill. But now your foremost task is to guide others in accomplishing the tasks assigned to them. In a sense, you are delegating to others what you used to do.

The manager must use the managerial functions (planning, organizing, staffing, directing and controlling) in a coordinated manner. Furthermore, he must have the proper authority to administer and carry out those functions.

Managers on all levels use all five of the functions, but they will not be involved in each function to the same extent. Your particular involvement is going to depend on your responsibilities, position, and the number of employees under your supervision as well as the number of persons over you. However, all managers must be involved with all of these functions to some extent.

FUTURE REFERENCE

Caskey, Clark C., "The Functions of Management", Journal, American Water Works Association, Volume 64, No. 6, June 1972, pp. 361-366.

> "Individuals should aspire to expanding responsibility in present supervisory positions, or to move up. Organizing, directing, and controlling are mere words until we dig beneath the surface and use them. There is a specific body of knowledge concerning the managing function. The individual who acquires as much of this knowledge as possible and who puts it to work for him in a balanced fashion will start to move upward."

Louis, Leo, "Better Tools for Management", Journal, American Water Works Association, Volume 58, No. 2, February 1966, pp. 146-151.

> "The manager himself must change with his times, must avail himself of the methods for effectively solving problems undreamed of a generation ago."

For basic reference on supervisory management, the following books supplement your basic textbook. These books are referred to throughout the course with specific references at the end of the lessons.

Davis, Keith, Human Behavior at Work, Fourth Edition, New York McGraw Hill Book Company, 1972.

Kazmier, Leonard J., Principles of Management, A Programmed Instructional Approach, Third Edition, New York McGraw-Hill Book Company, 1974.

MINI REVIEW: SECTION 2

Not to be sent in.....(remember, the answers are at the bottom of the page)

_____1. The supervisor's JOB requires two main components which include first, sufficient knowledge of the job he is to perform and technical competency to accomplish the tasks assigned.

a. True
b. False

_____2. One of the two questions to ask to indicate whether a person is truly a manager includes

a. does he possess authority?
b. does he work independently?
c. does he always seem overburdened?
d. has he been with the company for a long time?

_____3. The managerial function which includes the guiding, teaching, motivating and supervising of treatment plant shift operators is

a. planning
b. organizing
c. staffing
d. directing
e. controlling

_____4. The managerial function which involves devising an appropriate system of pay is

a. planning
b. organizing
c. staffing
d. directing
e. controlling

_____5. As departments grow, coordination requires more_____from the treatment plant superintendent.

a. staff meetings
b. delegation
c. people
d. equipment

* * * * *

Have an idea what these functions are all about? Feel confident on handling the first test? If so, turn to the testing part of this lesson. Just follow the directions, and good luck.

ANSWERS: 1) a 2) a 3) d 4) c 5) b

TEST ONE INTRODUCTION

You have completed the first lesson's assignments now--and your first test portion is coming up. The objective part of the test asks you some fairly detailed questions over the reading assignments. The subjective part for the first lesson requires you to analyze the lesson's content in a more general way. The subjective portion here also provides you with an opportunity to look at the trends that are taking place in the water or wastewater field. In this revised edition of the student manual, we have included some of the comments of prior students which pertain to specific lessons or assignments. Hopefully these comments will provide encouragement--or at least let you know you are not alone in finding the subjective portion challenging (but beneficial).

"The subjective portion makes you think about what you have read--and this course is put together in a way that I am able to understand what I am reading." LL

"I thought the subjective portion was good--it made me think and evaluate my present position as a manager of a valuable resource--people." HGL

"I assumed the first lesson would only be introductory, but it does have flesh on its bones. There are some good thoughts and it whets my appetite in what it promises." FFJ

"I've found the course very good so far. I feel almost personally involved in the River City facility." BJH

"The subjective portion was much more difficult than the objective test. More time had to be spent on this part resulting in closer study of the text and; I hope, more retention of knowledge." DMW

"The subjective portion tends to bring out personal thinking. I am impressed that the first lesson is almost identical to my experience." CHM

"The subjective portion is an essential part of the course in that managers must define and use the material gained in the light of what they already know--to determine where the changes are necessary." ML

"The subjective portion really made me think about our own plant's problems and what problems could crop up when our new treatment plant goes on line." JT

"The actual 'case style' lesson, using a water utility example, reflects the current everyday situations which do arise." WJB

"Gets the old brain working--again." RAJ

NAME______________________

LESSON ONE

SUPERVISORY MANAGEMENT IN THE WATER AND WASTEWATER FIELD

I. Objective Test for Lesson One-----complete this section
II. Subjective Portion of Test----see the pages following the objective test questions, for Parts I and II

STUDENT'S NAME______________________________

ADDRESS______________________________

____
CITY STATE ZIP

This is your first lesson which means there are six more to go. This will be graded and returned to you shortly--but do not wait to get started on Lesson Two.

Finished? Then just send this to:

Self-Study Course Coordinator
432 Eppley Center
Michigan State University
East Lansing, MI 48824

OBJECTIVE ANSWER SHEET
(circle the correct answer)

1. a b c d
2. a b c d
3. a b c d
4. a b c d
5. a b c d
6. a b c d
7. a b c d
8. a b c d
9. a b c d
10. a b c d
11. a b c d
12. a b c d
13. a b c d
14. a b c d
15. a b c d

		PASSING		NOT PASSING
Objective Test Score Number Right:		15 14	13 12 11	10 9 8 7 6 5 4 3 2 1 0
Subjective Portion				
Part I	A.	Superior	Satisfactory	Not Satisfactory--do over
	B.	Superior	Satisfactory	Not Satisfactory--do over
Part II		Superior	Satisfactory	Not Satisfactory--do over

Note: BOTH the Objective Test and the Subjective Portion must fall into the Passing category for you to receive credit for this lesson. If either or both parts are NOT acceptable, please rework that part to receive credit.
IF YOU HAVE ANY QUESTIONS, PLEASE DO NOT HESITATE TO WRITE IMMEDIATELY.

OBJECTIVE TEST: LESSON ONE

This Test covers both Sections 1 and 2 of Lesson One in the Manual and includes Chapters 1 and 2 in the Text.

This is your first test. You are to send in the answer sheets (just the answer sheets) in both the objective test and the subjective portion. You may leave this test itself in your book to use for personal reference. The answer sheet in this part is located on the preceding page, page #

1. Certain characteristics of supervision generally appear to encourage more productivity and employee satisfaction, regardless of the type of work being performed.

   a. True
   b. False

2. The 1970's have had a shortage of persons in the ________ age bracket as far as employment is concerned.

   a. 17-24
   b. 25-35
   c. 35-50
   d. 50-65

3. The supervisor who organizes the employees so that the assigned tasks are completed is demonstrating ________________.

   a. coordination
   b. cooperation
   c. a willingness of employees to work together
   d. delegation

4. A manager is one who:

   a. gets things done by himself or herself (that way you know they ARE done)
   b. gets things done with and through other people
   c. gets things done by working right alongside other employees
   d. gets things done by any or all means possible

5. The need for individuals with managerial skills will be ______________ in the future, considering the employment trends.

   a. decreasing
   b. increasing
   c. constant
   d. unknown

6. By 1980, it is expected that there will be well over _____ water and wastewater utilities.

   a. 50,000
   b. 75,000
   c. 100,000
   d. 200,000

7. All managers perform all five functions, although the amount of time spent at each function differs between managers and their particular areas of responsibility.

   a. True
   b. False

8. One of the reasons why supervisors tend to fall back upon their technical skills is that application of such technical skills often brings immediate and direct feelings of accomplishment and satisfaction.

   a. True
   b. False

9. It has been estimated that there will be a need for ________________ supervisors and managers by 1985.

   a. 30 percent more
   b. 30 percent fewer
   c. 5 percent more
   d. 10 percent fewer

10. The five functions of the manager or supervisor as listed in the text are:

   a. planning, organizing, staffing, directing, controlling
   b. planning, motivating, delegating, coordinating, and controlling
   c. planning, maintaining, communicating, organizing, and controlling
   d. planning, directing, staffing, motivating, and controlling

11. In general, women now occupy more than __________ of the work force, although the percentage of women in the water and wastewater field is still far lower.

   a. 10 percent
   b. 20 percent
   c. 30 percent
   d. 40 percent

12. The managerial function which answers the question "how will the work be divided and accomplished?" is that of:

   a. planning
   b. organizing
   c. staffing
   d. directing

13. The trend in employment today appears to be toward:

    a. having the supervisor fit more people more specifically to the tasks to be done
    b. having the supervisor fit more jobs to the employee
    c. hiring individuals to fill a certain jobs without much promotional emphasis
    d. hiring individuals only at entry level positions

14. The managerial function which includes guiding, teaching, and supervising subordinates is:

    a. organizing
    b. staffing
    c. directing
    d. controlling

15. Leadership is:

    a. born into a person, not made
    b. provided only through a person's position
    c. the ability one possesses to influence others
    d. automatic as a result of the supervisory position of responsibility

This is the end of the Objective Test, NOW, go right on to the Subjective Portion.

NAME____________________________ Lesson One
Subjective Portion
To Be Sent In

SUBJECTIVE PORTION, PART I.

PART I. A. Changes have been occuring in the water/wastewater industry. List five changes that have most impressed you in the past five years in your utility, or in the general industry. s

1.

2.

3.

4.

5.

PART I. B. Look over the list below of these areas and circle the three (3) items which you feel are being, or have been in the past, the greatest source of discontent or problems for you. Give the reasons for your choice in each case. (Use as much space as you need, back of this sheet or extra sheets.)

1. growing population--keeping up with the demand
2. changing makeup of employees, minorities, etc.
3. advancing technology--keeping up with innovations
4. motivation of employees
5. problem solving
6. communication
7. authority delegation
8. planning
9. organizing
10. staffing
11. directing
12. controlling
13. labor relations

GO RIGHT ON TO NEXT PAGE

NAME__________________________

Lesson One
Subjective Portion
To Be Sent In

SUBJECTIVE PORTION, PART II.

PART II. Wilbur had to pick up the reins at the River City Utility System without much help. He used the correspondence on Herb's desk to give him an idea of the types of problems he would be encountering in the coming days. Wilbur decided to group the problems facing him into the five managerial functions. Read over the letters and memos carefully, and list each one under at least one category (some will indicate problems which overlap into two or more categories). For some memos, there is no one best answer as we are interested in your analysis of each one. Use the back of this sheet if more room is needed.

1. Planning

2. Organizing

3. Staffing

4. Directing

5. Controlling

This concludes the Test Portion for Lesson One. Please send in the answer sheets for ***both*** *the Objective and Subjective Portions. Now, turn the page to complete the Get-Acquainted questionnaire. . . .*

NAME________________________ Lesson One
Inquiry Sheet
ADDRESS_____________________ *To Be Sent In*
____
____

GET-ACQUAINTED OPPORTUNITY

By now, you probably know more about us and this course than we know about you. The consultants who work with the course would like to know you personally, but a correspondence course makes this difficult. However, you can introduce yourself by answering the questions below. We've left a place for you to add anything that we've not covered. We appreciate your help!

About YOURSELF:

1. Your job (title, description, etc.)______________________________
____
____

2. Have you taken any other correspondence courses? YES NO

If so, please check the appropriate courses:

____ Water Operator course, California State University-Sacramento
____ Wastewater Operator course, California State University-Sacramento
____ Military courses (through any of the armed services)
____ International Correspondence School (ICS) courses
____ Clemson University courses
____ Other; please list:_____________________________________
____
____

3. Circle the highest educational level completed:

8th grade High school or equivalent Trade School ___yrs. College

9 10 11 12 1 2 3 4

Degree? AB__ BS__ BA__ MS__ MA__ PhD__ Other?____________

Major?____

Graduate work? ____yrs.

NAME________________________ Lesson One
Inquiry Sheet
To Be Sent In

4. How old are you? 17-25 26-35 36-45 46-55 56-65 66+

5. Is your work primarily in wastewater treatment? _____; Years?_____

Is your work primarily in water treatment? _____; Years?_____

Another area? _____; Please list:____________________________; Years?____

6. Why are you taking this course? (Please be as specific as possible)____

____

____

____

7. How did you hear about this course?

Received brochure in the mail _____

Employer (please name)____

Publication (which one?)____

Other (name, etc.)____

8. Will you be (or have you been) reimbursed for the cost of the course? YES NO

If yes, who will be paying for the course?

Employer? (please name)____

Other? (please name)____

Will you have to complete all the lessons first to be reimbursed? YES NO

NAME_______________________ Lesson One
Inquiry Sheet
To Be Sent In

About the COURSE:

Please answer the appropriate questions below. Your comments are crucial to the improvement of the course. We really appreciate these evaluations.

1. (a) How accurate and appropriate did you find the case example for Section One? (Circle the best answer or write your own)

   Very realistic   So-so, at least it did not turn me off   Basically inappropriate

   Other:

   (b) What about Section Two?

   Very realistic   So-so, at least it did not turn me off   Basically inappropriate

2. What difference do you find between your utility system and the one in River City? (Try to list all the major differences that you see)

3. What aspects of this first lesson did you find particularly beneficial? (This could include a certain portion of the manual--or the text.)

4. What did you expect from this first lesson which is different or lacking? (Do not hesitate to speak your mind--that is one of the chief ways that this course will improve)

5. How was the objective test: Too hard   OK   Too easy

6. What did you think of the subjective portion of this lesson?

7. Anything else on your mind--about the lesson, manual, or course?

All finished? Be sure to enclose this questionnaire along with the answer sheets for both the Objective and Subjective Tests for Lesson One.

LESSON TWO

THE MANAGER'S RESPONSIBILITY TOWARD DELEGATION AND MOTIVATION

Section 1: Delegation: Authority
and Responsibility

Assigned Text Reading: Chapter 3

Section 2: The Manager
and Motivation

Assigned Text Reading: Chapter 4

> --Is the poor safety record in treatment plants a result of employee failures or failure of management?
>
> Victor G. Wagner, WPCF President for 1975-6, from his Presidential Message, Journal WPCF, September, 1976, p. 2104.

LESSON TWO - SECTION 1

DELEGATION: AUTHORITY AND RESPONSIBILITY

Wilbur leaned back in his chair and wiped his forehead. Friday afternoon already--what a week it had been. Guess he had known all along that it wasn't going to be easy, but like this? He'd figured on the shock and confusion that had followed the accident, but he really hadn't expected all these other problems besides. Not that any one problem that had come up so far had been particularly severe. No, it seemed to be just one thing after another--all relatively minor problems but pretty soon those problems were going to turn from molehills into mountains if he didn't dig into them.

There was a knock at his door, and Wilbur ran his eyes from his appointment book to the clock almost simultaneously. "Come in," he called as John Whipple, the chief operator, opened the door and moved into the room, taking care to close the door after himself.

"You wanted to see me?" he questioned as Wilbur waved him toward the chair beside the desk. "Not doing the job these days?"

"John, these days you KNOW you're indispensable, " Wilbur came across heartily. "No, I'm concerned about these overtime memos from Ron and Gary. They may have a point, but we can't afford to pay overtime on a regular basis. Ron operates a wet air oxidation process, I understand, and Gary the vacuum filtration process, both over their lunch hour. Now, they want to be paid for this time. Our budget is strained enough as it is. We may have lost Herb, Jim, and Pete, but their salary will go to their widows for some time. haven't these operators been doing this job right along? Why these sudden demands for overtime?"

"Those kids," Whipple exploded. "Many's the time I used to come in on weekends just to check on the machinery without anyone even asking me--and I never even mentioned it--much less asked for extra money. They just don't really care about their job."

"Well," Wilbur wanted John to go on talking, "their files indicate that they have been doing well on the job."

"Yeah, as long as they get paid for every minute," Whipple cut in. "These kids just don't care about the utility. They just want that paycheck."

"Well, the union contract does insist that we pay employees for the work they do--and that means all the work they do." Wilbur reminded Whipple. "Isn't there some way we can schedule them so they are working the regular number of hours and still operating the sludge thickening and disposal equipment? What about giving them longer breaks before and after lunch, or maybe staggering their lunch hours so that one fellow is working while the other one is having lunch?

Wilbur's suggestions were interrupted by a knock at the door, as Ron Appleton opened the door, and poked his head in.

"Hey, sorry to interrupt, but the sludge flow meter is acting up. John's the only one who knows how to get it going again. John, could you just fix it and then come back?"

"Sure," Wilbur waved John toward the door, "got to keep this show running. Come back anytime this afternoon, John, and we'll resume our conversation," Wilbur called as John was already into the outer office. "Besides this breakdown, how are things going, Ron?" he asked as Ron was preparing to follow John. Ron stepped closer to Wilbur's desk.

"Oh, you know, same old thing, so-so," he replied.

"Like your job here?" Wilbur pressed him.

"Well, I'd like it better if someone noticed our work a bit more. Whipple is a good boss, I guess, but he seems to feel that no one can do the work like he did in the good old days. Gosh, Gary and I spend a lot of extra hours around here, just doing little things--and Whipple never even acknowledges our efforts. We finally decided that if we weren't going to get any thanks for our efforts, we'd apply for some well-earned pay."

"I think I'm beginning to understand," Wilbur told Ron. "Your files do carry some good reports on both you and Gary. But, I guess the message hasn't been sent back down to you two. Come back and see me when there's more time to talk--we need to go more deeply into this matter."

Wilbur leaned back in his chair and considered the situation of John Whipple and the other operators. Wilbur was pretty certain that John Whipple thought his job involved doing, instead of delegating many tasks to any of the operators. Remember, Whipple had been needed to perform these routine operations, Ron had said. Certainly, Ron or Gary or any of the other operators could have performed these routine duties with a bit of training. But their training seemed to be the problem--Whipple performed the tasks himself--and did not stand by and teach the others how to perform them. Wilbur did not doubt that Whipple worked well beyond his 40 hours a week. But while Whipple saw this as a matter of pride, Wilbur saw it as an example of the man's inability to delegate. Unlike Hal, Whipple seemed as healthy as a horse; he hadn't taken a sick day in six years, according to his file. How was Wilbur to get this concept across to Whipple?

Wilbur recalled his own experiences with delegation. He had needed a few reminders before he had improved his own delegation ability. How had he begun to realize what was involved in delegation? Wilbur certainly had to thank one of his former bosses--who had taken the time and effort to help Wilbur. And, Wilbur realized, this boss had set a pretty strong example to follow, too. Wilbur remembered reading an article which had laid out some sensible delegation principles in a clever, easy-to-read fashion.* What was it the article had stated now? Oh, yes. It viewed all those tasks which subordinates were to be doing as monkeys. The object was to keep those monkeys on the backs of the subordinates where they belonged--not on the back of the manager. Maybe he could find a copy of that article for John. That might help to show John how to start delegating properly. What else could he, Wilbur, do?

* * * * * * * * *

Wilbur's problem here is a very familiar one to many managers: how to get others to spread the work around. This is even a very common problem for managers themselves. Yet, the delegation of authority is at the very crux of the concept of managing.

As an example, the following is an *actual* quote made by a supervisor in the wastewater industry at a seminar held at Michigan State University:

> "I find myself not giving the men under me any independence and freedom to do the work I assign them. I so often lead them through each problem rather than explain to them what I want and teach them what they need to know, then let them go. I do not have enough trust in the workers to let them think for themselves. This distrust on my part will not encourage any freedom or motivate any of the workers to do good work."

Is this lack of delegation a problem you have experienced at any time in your career? If not, you are to be commended, since this problem is common in the industry!

---

* Oncken, William Jr., and Wass, Donald L. "Management Time: Who's Got the Monkey?" *Harvard Business Review*, November-December, 1974. (*see* Future Reference at the conclusion of this section for a brief summary).

Look over the "Questions to Ask Yourself" section, page # 87, then go on reading in the text and see if you can pick up any solutions to Wilbur's latest dilemma.

DELEGATION: AUTHORITY AND RESPONSIBILITY

Authority and the delegation of authority were mentioned in Lesson One. But this area is certainly important enough to warrant a section all its own. Read the text carefully, but be sure to go over the following outline to help you zero in on the most important portions.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Importance of Authority to the Supervisor?

- What is meant by authority?
- What is meant by the concept "formal origin of authority?"
- The difference between formal origin and acceptance origin of authority?
- The limits of authority?

What is Meant by Delegation of Authority?

- The responsibilities which accompany the delegation of authority?
- What is meant by defining authority limits?
- What is meant by unity of command?

What is Meant by Decentralization?

- What is meant by decentralization as it applies to authority?
- The varying degrees of delegation of authority?

The Role of the Supervisor in Delegation?

- The reasons for the reluctance of supervisors to delegate?
- The benefits of delegation?

What is Meant by the General Approach as Related to Supervision?

- What the general approach to supervision implies?
- What is meant by the advantages and disadvantages of the general approach?

The Authoritarian Approach as Related to Supervision?

- What the authoritarian approach to supervision implies?
- The advantages and disadvantages of the authoritarian approach?

The Benefits of One Approach Over the Other?

* * * * * * * *

Now - turn the page to check YOUR approach to delegation. . . .

HOW'S YOUR DELEGATION?

This is a checkpoint for YOUR benefit--put down your candid response.

YES	NO		
___	___	1.	Are you involved with everything that is going on?
___	___	2.	Are tasks accumulating, things unfinished, or deadlines not being met?
___	___	3.	Is more of your time spent on specific details rather than on managing and planning?
___	___	4.	Do you need to take work home more than twice a week?
___	___	5.	Do you work on weekends when you are not supposed to or put in longer hours than those under your supervision?
___	___	6.	Do you agree with the saying that to get a job done correctly you must do it yourself?
___	___	7.	Do you keep a very close watch on all aspects of the work of your employees?
___	___	8.	Do you hesitate to assign some jobs just because you enjoy them?
___	___	9.	Does your job cut into your recreational or family time?
___	___	10.	Do you keep certain job aspects secret because you feel your subordinates would be able to replace you if they knew the information?
___	___	11.	Do you need two or more telephone lines to get all your work done?
___	___	12.	Do you ask workers for their suggestions on work problems?
___	___	13.	Do you have many interruptions due to work questions, decisions, or advice?
___	___	14.	Do you spend some of your job hours on tasks which others could do?
___	___	15.	Do you feel that a supervisor should be overloaded with work to justify his salary?
___	___	16.	Do you insist that your employees bring most work-related problems to you instead of making those decisions themselves?

Are you suddenly curious about your ability to delegate? Check your score with the key on the following page. . . . .

How did you score? Count your 'yes' responses and compare with the scoring table:

Number of Yes Answers	
Two or less	Good going!. You already have a good grip on proper delegation.
Three to five	Read the following pages carefully. You might be able to use some of the following suggestions to give yourself more time to get YOUR tasks done.
Six to eight	Not too bad, but could be better. Read the following pages VERY CAREFULLY!!
More than eight	Whoops! You are probably too overworked to complete this lesson easily, but try hard, because you NEED this information!!!

DELEGATION: AUTHORITY AND RESPONSIBILITY

Assigned Text Reading:
Chapter 3, Delegating Authority with Responsibility

If you are like a majority of the middle managers in water and wastewater systems across the United States today, you have worked up into your position through the ranks--through the accounting, engineering, or operator route. If your facility was large, you have probably looked forward to the time when YOU could boss some of the other employees around. (You probably never admitted this to yourself; actually, however, underneath...)

In this section of Lesson Two, you are going to be told to pass along some of that hard-earned authority. Not only give it away, but give it to the maintenance crew, plant shift operators, or technicians that you supervise. It may be a bit difficult for you to accept this idea--but this is one of the responsibilities of a manager--to delegate authority. Your skill and knowledge come into play in knowing just how to delegate this authority.

Delegation Difficulties

"What?" You say. "Delegation is difficult? But delegation is easy. That's the problem. You just tell someone else what to do and then THEY do it. The hardest part is sitting around, trying to look busy, while someone else is off doing your work." (Ever hear the story of the chap who complained to his co-workers that the foreman had fired him. His version ran as follows: "You know, the foreman, the person who sits around telling others what to do." "Yes, we know who you mean, but why did he fire you?" "It looked as if I had become the foreman.") Delegation is difficult--especially for the manager who has worked up the ladder, because the expertise which prompted many promotions is now NOT put to use. Technical skills suddenly take second place to people-managing skills. Let's look at some reasons why delegation IS difficult.

Reasons Behind Delegation Difficulties

1. "If you want anything done right these days, you have to do it yourself!" Sound familiar? But, if you do EVERYTHING yourself, you won't be able to do half the things you ought to be doing.
2. "Joe just can't do that job!" Have you given Joe (or Janice or Steve,...) the right training and instruction and experience to be able to do the job?
3. "I can't let a mistake occur--we could poison the entire community." Look at the other side--YOU might be so busy that a mistake could occur because your time had too many demands upon it.
4. "By the time I explain the job to Joe (or Janet or Steve,...), I might as well do it myself." Oh, zeroing in on some communication problems now? Well, read on because communication is covered in Lesson Three.

These four points summarize many of the major reasons why managers find delegation difficult. You may also have a few personal reasons which are not included in this list. Whatever your reasons, read on to learn how you will be able to improve your delegation.

KEY POINTS

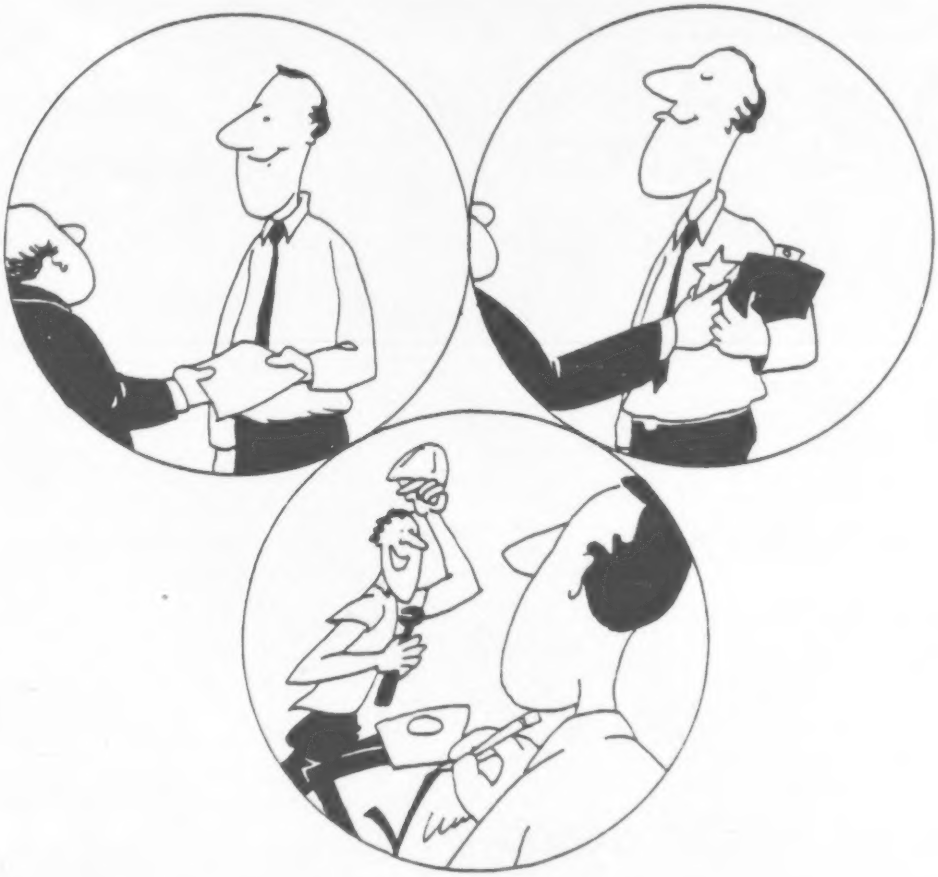
Authority

"Authority is the right or power to direct or request subordinates to do or to refrain from doing something." (see text, page 35). If you do not have such authority, you are not really a true supervisor.

This authority comes from your position, yet it must also be accepted by the employees. The supervisor must be aware of the limits to this authority--both so that this authority is utilized to its maximum, and so that the supervisor does not step beyond the bounds of this authority. A field crew chief must have the authority to erect barricades which protect his workmen from passing traffic, thus enabling him to discharge his responsibility to get work done, yet provide safe working conditions. He must also have the authority to enforce published safety rules and regulations.

Delegation of Authority

There are many reasons for delegating authority—but the prime reason is to utilize the human resources of an organization to the maximum. It may be that the plant superintendent could operate the treatment process better than the employees, but the supervisor could hardly accomplish all of the supervisory and operational work in the necessary amount of time. Hence, he delegates the operational tasks to responsible employees in a manner which will produce smooth and efficient operation.



First, duties must be assigned; second, the authority to accomplish those duties must be granted; and third, responsibility for performing those duties must be assumed by subordinates.

The Three Components

The delegation of authority is a three-component process as pointed out in the text. First, duties must be assigned. Second, the authority to accomplish these duties must be granted. Third, the responsibility for performing these duties must be assumed by subordinates.

Look at each of these components carefully. First, consider the duties to be assigned. Remember, you are not a manager unless you are working through other people. If you are doing the work yourself, you are not managing. Many would-be managers hesitate to assign duties because they are not CERTAIN that the designated employee is ABLE to do the job. Are you in this predicament? If you do not feel that the employee has the proper TRAINING, then you should provide that training. Do you know the proper steps in employee training? You might describe them as follows:

1. Determine the Need. This is where you find out if that employee needs the training, or any part of it. This is also where you find out if the employee has had any prior training which might work against the training at hand. Some untraining or retraining might be in order.
2. Define the Objective. Giving the employee a view of the whole operation can be a powerful motivating force. It also helps the employee to do the job correctly by grasping the whole idea.
3. Detailed Explanation. This is where you explain to the employee exactly what is to be done. You might want to break this down into several steps--to avoid overloading the employee with information all at one time.
4. Demonstration. You show the employee what is to be done. This is your turn to shine, to use your skill. But DO NOT STOP HERE. Many supervisors assume that if the employee has been told

and shown what to do, the employee KNOWS how to do it. Not so. (Keep on reading!)

5. Discussion. This is a time when you have the employee tell you what you have just told him or her. It is a time to repeat back the instructions.

6. Drill. This is the employee's chance to shine. You have provided the training, but you now have the opportunity to make certain that the employee KNOWS and is able to do the task. From this point on, you should feel that the employee is able to handle the task, but be careful not to, figuratively, slam the door in the employee's face. Conclude with a statement like "when any other questions arise, Jones, don't hesitate to ask me." But leave the employee with the confident feeling that you feel he or she is capable of handling the job.

Second, grant the permission or authority to accomplish the task. This second component appears quite obvious, but this is a difficult aspect for the beginning supervisor to handle. The employee could scarcely be expected to handle the task without needed authority. But it is here that the supervisor's expectations are put to the test. If the supervisor still doubts the ability or willingness of the subordinate to carry out the task successfully, and hence, is reluctant to turn over the required permissions, then perhaps another individual should be selected. OR, the supervisor should realize the true reasons for the reluctance. If you feel that granting the proper permission is cutting into your job, remember that a manager is one who gets things done THROUGH others.

Third, the subordinate must assume the responsibility for performing the assigned duties. Here the manager becomes the person to see that the work has been accomplished, NOT the person to do the work. If the employee has not accomplished those assigned tasks, the manager is the one to find out why not. Warning is appropriate here. As a manager with probably many years of work experience behind you, it is often unrealistic to expect the employee to do the task as quickly or as thoroughly as you might be able to do it. The temptation will be to curtly dismiss that employee and to do the task yourself, because, as the old adage goes, "if you want something done right, the only way is to do it yourself." But if you barge in and do it yourself, YOU are falling down on YOUR job--that of being a good supervisor. And, you are taking valuable experience away from that employee. In such a case, everyone loses. A supervisory position requires patience--and a concern for growth in employees.

Principles of Delegation

You probably do not need to be convinced about the importance of delegation, but delegation skills are often difficult to acquire. Yet, your performance as a manager DEPENDS to a great extent upon this delegation ability, since you have passed the point where you could--or should--do all the designated tasks yourself. Managers are judged in part on how these tasks are performed BY OTHERS, not themselves. When a manager delegates, he gives the responsibility and authority for certain tasks to others. In turn, the manager takes on new responsibilities--that of coordinating those tasks, overseeing them in an evaluative and controlling manner.

Here are some guidelines to follow in your delegation:

1. Delegate by both words AND actions. If you tell an employee to be responsible for a certain task, do NOT meddle unless your help is needed (usually by request).

2. Delegation utilizes many communication skills (see Lesson Three in this manual for more in this area).
3. Delegation involves responsibility, and the accompanying authority required to carry out that responsibility. The person to whom the task has been delegated is then ACCOUNTABLE to the manager, or the person who did the delegating.
4. The delegation should be specific and control points should be established—often in the form of end results.

Decentralization

The more that authority is delegated, the more an organization is said to be decentralized. While one can speak of narrow or broad delegation, these terms are relative and the decentralization of one organization may be described in terms of comparison with other similar organizations. Delegation of authority, in the history of most organizations, has been increased as the organization becomes larger. Your utility may have undergone some expansion recently, creating new department or process changes which have increased the number of tasks to be performed. This has made it necessary to delegate more authority to the managerial personnel.

Benefits of Delegation

Take note of that statement in the text, "It's the supervisor's job not to do, but to get things done." That is a tidy summation of the role of a supervisor or manager. It is also true that if the supervisor keeps on doing some tasks instead of organizing the employees to do them, they will never learn how to accomplish some of those jobs. They will, at least, not learn how to do them as well as the supervisor.

The General Supervisory Approach

This approach may be viewed as combining a supervised work situation with the 'one's own boss' elements of freedom to a degree. This approach tends to follow a very participative style. As a result, it includes a great deal of employee motivation.

Notice the advantages of this approach. The supervisor has more time to devote to organizational and administrative matters requiring his attention because a number of operational and maintenance tasks are delegated to other workers and employees. These employees are closer to the situation than the supervisor and are making decisions about matters with which they are directly acquainted. Because the employees are self-directed, their motivation should be higher.

The Authoritarian Approach

This approach is the opposite of the general supervisory approach. It tended to be used far more in the past than it is today. Today, this approach is out of step with the general nature of the modern manner of thinking. It also tends to reduce employee morale and motivation.

Again, both of these approaches are extremes. The supervisor must decide just how much freedom and responsibility should be delegated. At the same time, he or she must carry and use enough of the authority of his or her position to make certain that all tasks are accomplished.

Now look at the actions of John Whipple. John has not delegated enough of the work assignments. It appears that John has not really followed any of the three steps in the delegation process. One, he has not trained the operators in a thorough, step-by-step fashion. It appears that they know the tasks at hand, but Whipple might be able to add to their knowledge. Second, he has not given the proper permission. Third, instead of making the operators responsible for the tasks, he keeps running in to do it himself. The situation involving John Whipple is easy to see, and many of you are probably able to understnad John's reluctance to delegate. But, if John continues in his non-delegation fashion, he will most likely lose some good employees, have lower employee morale, and he might just overwork himself in the process. Life could be much happier for John Whipple if he applied some appropriate delegation.

REVIEW

This section has stressed the supervisor's responsibility for the proper delegation of authority among his subordinates. Now, how are your delegation techniques? If you have improved your delegation, then you have mastered the most important aspect of this portion of Lesson Two.

Steps to Better Delegation

Use these steps in achieving your goal of better delegation:

A. The Tasks

1. Jobs which encourage growth in employees.
2. Standardized or routine jobs.
3. Tasks which are too time consuming for the manager.
4. Jobs which you are able to do, but which others could do too.

B. The People

1. Select on the basis of ability (present and future potential).
2. Choose those who would be challenged and excited by the job (and want it).

C. The Delegation

1. Clearly and completely describe the task (remember all of those 6 D's of Training?).
2. Show how the task helps the utility.
3. Explain how task (hopefully) helps the employee.
4. Describe the task in terms of objectives not functions.
5. Make certain the employee has agreed to do the task.
6. Make provision for employee independence in completion of the task (Example: Allow employee to work out the 'how-to' of task; your concern is that the overall objective is met in a manner which benefits all).

D. The Completion

1. Set a means by which to evaluate the completed task. (This might be final reports by employee or even records of progress).

2. Provide for personal contact with employee. (Remember the emphasis on communication).

3. Get opinions of others as to progress of employee.

4. Reward the employee for successful completion. (Praise, encouragement, showing how the utility was helped in general, etc., are all rewards).

REMEMBER, watch for these pitfalls in delegation:

1. Task is not clearly defined. (How can you expect someone to accomplish something if they are not certain just what they are to do?).

2. Regulations not clear. (People have to know what they are up against).

3. End result not clear. (How are the employees, or YOU for that matter, going to know when the job is done? And, done correctly?). Remember, as well, that the employee may not be able to do the task as well as you are able to--AT FIRST. (But then, you probably needed experience when you were first beginning, too).

4. Manager does not tell employee enough about HOW to do the task. (The employee may well understand what is to be done, but if a general direction is not laid out, valuable time may be lost).

5. Manager tells the employee too much, by laying out each step. (This is not delegation, this is an exercise in rote memory. You want the employee to complete the task--and sometimes, their method of accomplishing that task might be far easier than your own method).

6. Manager's style in acquainting employee with tasks to be performed is not as appropriate as it might be. (This might be the MAJOR pitfall for many of you--especially you younger middle managers with a host of older employees under your supervision. TACT is a massive word in such cases, when you have to work through a lot of 'reverse generation gap' problems. This is not to say that the problem is only with you--but whether your credibility is accepted or not, your task is to assign jobs to those employees, and the more readily and happily those tasks are accepted by those employees, the better the job will be—for everyone).

Have you mastered "Delegation?" Try the Mini Review and then move on to the Test Portion. . . .

FUTURE REFERENCE

Davis, Keith, Human Behavior at Work, McGraw-Hill Book Company, New York, 1972, pp. 196,203.

The relationships and duties determined by division of work are communicated and assigned to each person by means of *delegation*, which is defined as the assignment of duties, responsibility, and authority to someone else. If he accepts the assignment, he then becomes his manager's "delegate" or representative. If he does not accept, delegation has been merely attempted. Delegation permits a manager to extend his influence beyond the limits of his own personal time, energy, and knowledge.

Studies show that poor delegation is a primary cause of managerial conflict and failure. In one survey of managers who had supervised other managers who failed, inability to delegate was mentioned more than any other item. Some managers feel that delegation is giving away something, so they cannot psychologically bring themselves to it for fear it will weaken them. Others are such perfectionists that they have no confidence in letting others do work for which they are responsible. However, all need to realize that delegation is the act which initiates management. If there is no delegation to others, there is no one to be managed.

Oncken, William, Jr. and Wass, Donald L. "Management Time: Who's Got the Monkey?" Harvard Business Review, November-December, 1974. pp. 75-80.

Tasks to be delegated to subordinates are viewed as monkeys which straddle the back of a willing individual. It is one of the manager's responsibilities to see that these monkeys remain where they are supposed to be--on the backs of the appropriate subordinate. The manager is not to do these tasks--the manager needs the time for the jobs which the MANAGER is supposed to accomplish.

The article contains a number of wise (and witty) observations on the "Care and Feeding of Monkeys" which include such aspects as "monkeys sleep just as soundly on the backs of subordinates as the backs of superiors" or, "monkeys should be fed by appointment only. The manager should not have to be hunting down starving monkeys and feeding them on a catch-as catch-can basis."

The ultimate conclusion of the atticle should be a motto for all managers: "Get control over the timing and content of what you do."

MINI REVIEW: SECTION 1

Use this review quiz for a quick check to see how you mastered the material in this section. (Remember, you may check your answers yourself--do not send this in for correction)

_____ 1. Authority is

a. ultimate power
b. the right to direct or request subordinates to do or to refrain from doing something
c. the power to reprimand and punish subordinates for doing or not doing something
d. both b and c

_____ 2. Supervisors may receive their formal authority from their position but their acceptance must come informally from the employees.

a. True
b. False

_____ 3. There are generally more limitations on authority the farther one _____ in the organization.

a. ascends
b. descends
c. moves horizontally
d. remains

_____ 4. The ultimate source of authority in an organization is

a. the boss
b. every supervisor
c. the employees
d. all are equal

_____ 5. The chief executive is in close touch with all aspects of the organization. This illustrates, most likely, what type of authority delegation?

a. limited delegation
b. no delegation
c. broad delegation
d. total delegation

Ready for the test portion of Lesson Three? Yes? Then, go to it......

* * * * *

ANSWERS: 1) d 2) a 3) b 4) a 5) b

The middle supervisor is just that--in the middle.

LESSON TWO - SECTION 2

THE MANAGER AND MOTIVATION

Thursday afternoon already. Wilbur could not believe how fast the time was flying by. The end of his fourth week in River City was coming to a close. Watson, the general manager, had been calling him at least once a day to tell him how fortunate they were to have a man of his caliber manning the fort. Watson was up on his communication skills, Wilbur reflected, at least as far as praise and feedback were concerned. Watson had also told him that he had been unable to locate any potential candidates for the position of assistant manager, although they were expecting soon to interview several persons for the job of head positions in both Maintenance and General Services. Wilbur shook his head. Pity that neither Hal Jones nor Jim Johnson were really capable of moving up into those positions. Hal, as assistant head of maintenance and engineering, was qualified but had all those sick days. And Johnson s injury still was inhibiting him, although his last medical report had hinted at the possibility of a complete recovery if Johnson would keep up his exercises.

Wilbur wondered what had actually happened to Jim Johnson's hand. He opened Johnson's file and examined the medical report. It seemed unusual for someone in Personnel to have been injured on the job, but that is what had happened. Jim's fall had occured in mid-July according to his medical record, while he'd been out talking to some of the men in the engineering area. It appeared he had just slipped and had broken several bones in his wrist. Tricky thing to mend sometimes, Wilbur reminded himself, wincing as he recalled some of the agonies accompanying his college days on the football team. Still, nothing in the medical report indicated that Johnson would not completely recover.

Wilbur looked over Hal Jones's record too, to check out those sick days. Hal had a history of respiratory ailments, he noted, with repeated attacks of pneumonia. No wonder the man probably took to bed at the first hint of a cold. But still, Wilbur thought, his frequent absences might well be encouraging others to take sick days too and be part of the problem of the increasing absenteeism throughout the utility.

"Mildred," Wilbur called through the intercom. "See if Hal Jones would be able to come into my office for a brief talk this afternoon sometime. The best time for me would be at 3:30, but later would be OK."

Mildred called Wilbur back momentarily. "Hal will be in to see you at 3:30. Do you want any additional files or information?"

"No," Wilbur responded. "I've already looked over his medical report, and I also have a copy of the entire utility's absenteeism record in front of me."

Hal was in Wilbur's office promptly at 3:30. Wilbur motioned to the armchair in his office and moved from behind his desk to sit in the other chair.

"Hello, Hal," Wilbur greeted him as he shook Jones's hand. "Glad you could come in on such short notice."

"Wasn't difficult," Hal said, "the shop is moving along pretty smoothly these days, everything considered. Anything particular you wanted to see me about?"

"There is, Hal," Wilbur paused. "First, I was wondering how you've been feeling lately. I noticed you had a number of sick days earlier this summer, and even a few this month."

"Boy, I really had a time of it," Hal admitted. "Came down with a cold, that became pneumonia, and I seemed to keep getting setbacks just when

I thought I was on the road to complete recovery. Been a lot better, lately, though," he added.

"Been taking your vitamins, you mean?" Wilbur said, half-jokingly.

"Oh no," Hal protested. "No, I don't mean to speak ill of the dead, because I found Jim Smith a fair, hard-working man, but he didn't believe in letting a little pampering get in the way. No, he believed in hard, long work, and in economy, too. That's probably how I caught the cold in the first place. Remember the weather we had in July? It must have been the same where you were. Usually July is in the 80's. In an unusual year, we might have temperatures in the 90's or even the 100's. Well, you know this past July we had that freakish cold spell--in the 40's for days on end. Well, Smith wasn't about to turn on the furnace for that brief period, and disrupt our scheduled maintenance on it and all. Well, it got pretty cold back there sometimes, especially during the night shifts. So, we finally got the heat turned on and then, all of a sudden, the weather turned really hot. Smith waited about ten days before getting the air conditioning on. We roasted, let me tell you."

"I guess it was those temperature extremes which brought on my initial cold," Hal continued, "and then I kept trying to come back to work because Smith was really critical of sick time. But each time I got a relapse. Finally think I'm getting back up to snuff, though," Hal added.

"Getting rundown is difficult to overcome." Wilbur had a lot of empathy here--thinking back to a period of several years ago when he'd caught the measles, mumps, and chicken pox all in a row, from his grade-school age son. It had taken him almost two years to get his strength back. "You're looking good these days, Hal, if that's any consolation."

"We've been paying close attention to the temperature back there," Hal pointed out. "We've also found that the additional expense there is MORE than offset by having more productive employees, and fewer breakages."

"That's a wise observation, Hal--and one that all managers do not always realize." Wilbur carried on. "There are a lot of managers who tend to be penny-wise and pound foolish when it comes to things like safety measures. Are there any other aspects involving the health and well-being of our employees that we could improve?"

"Well, there are a few railings which might just give way if enough force were applied," Hal admitted. "Smith put off replacing them until we could do it all at once and get a better price on a bulk purchase."

"Oh boy," Wilbur exclaimed. "That's not something we're going to wait for if those railings are getting weak. Why don't you examine all the railings and accompanying structures as soon as possible, and get back to me with a report on them, OK?"

"That's great to hear, Wilbur." Hal looked downright relieved. "Personally, this is off the record, but I've been really afraid something serious was going to happen, like when Jim Johnson fell and broke his wrist last summer. But with all the emphasis on cost and doing one's designated job, well, it seemed like repairing those railings might look like a time-waster."

"Were you there when Johnson fell?" Wilbur asked, probably sounding more casual than he felt.

"Well, I was at work that day," Hal reported, "but I'd worked through my mid-morning coffee break and my lunch hour, so I ate about 2 pm, and that's when Johnson was in to see Smith, I gathered. In fact, from what they told me, Smith insisted on working while Johnson was talking to him, which is why they were out on the boardwalk."

"You mean, Smith insisted that Johnson talk to him while Smith was working on some equipment?" Wilbur questioned in amazement.

"Yes." Hal was more surprised at Wilbur's reaction than at the situation which had occured between Johnson and Smith. "That was a pretty common way to operate. Smith certainly allowed us to take our scheduled breaks and all, but he, himself, did not usually take breaks, and he somehow got the message across to us all that we had better do more than the usual if we expected a good performance rating. So we all tended to work long and hard and didn't waste much time--ever."

"I'll never criticize time spent on safety," Wilbur assured Hal, and rose, as Hal moved toward the door. "I'll look forward to that report on the repairs as soon as possible."

"You'll have it before Monday is over," Hal promised, as he left the office.

Wilbur jotted down Hal's report on his calendar for Monday and leaned back to contemplate the situation he'd just had explained to him. Suddenly, Hal's sick days appeared in a different light. It was true that Hal had never taken even a full week off, just two or three days a week, often never more than two days in a row. Maybe if Hal had fully recovered from his initial bout with pneumonia, he would not have had those relapses.

Wilbur was also getting suspicious about Jim Johnson's fall now. It was beginning to look as though Jim Smith had placed a lot of emphasis on getting the work done--but the conditions under which it had been accomplished might have been lacking in several respects. Maybe he had better start looking into the safety orientation and practices of the various departments at the utility. Maybe those increasing absences were not caused by a lack of motivation, but by injuries. And, motivating for safety was certainly important, if not more so, than motivation just to get the job done.

* * * * * * *

* * * * * * * *

Wilbur has an expanded approach to motivation in that he tries to view it on several levels. He is suddenly seeing a possible motivation problem which exists at the utility, not in terms of accomplishment on the job, but in terms of people's safety and well-being while on the job. And, eventually, ignoring the aspect of safety will hinder all the other aspects at the utility.

Motivation is a difficult area to deal with. John Whipple's refusal to adequately delegate some tasks to the operator's was certainly inhibiting their motivation for their job. The memo on the afternoon shift's tardiness also might indicate a different area which some employee motivation and morale boosting might be in order. However, Wilbur appears to be becoming aware of the motivational issues which exist in the utility. Now, to do something about them.

THE MANAGER AND MOTIVATION

Managers deal with people. That, in itself, is a challenge, since no two people appear to be alike. Hence, people may not respond in the same way--sometimes a perplexing situation for the manager. It is particularly puzzling when the problem of 'motivation' arises.

We all have difficulty, at some time or another, motivating others. Those of us involved with this correspondence course worry about maintaining motivation toward completing the lessons in the course. Some of you have no problem with studying--while others need an extra bit of encouragement. Indeed, without a classroom and interaction with the various other students (not to mention an instructor's presence) a person's motivation would have to be high to complete such a course.

A number of middle managers in the water and wastewater field have mentioned employee motivation as one of their primary areas of concern. This lesson is intended to give you some pointers for the solution of at least part of that problem. Some of the following information you may read and say to yourself, "I knew that already." But, have you used this information to bring about any changes?

Continue reading through the following question areas and then plunge right into the text.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Supervisor's Need for Knowledge of the Human Personality?

- All of the factors included in the human personality?

Biology's Role in Supervision?

- The physiological factors which can influence the human personality?

Surrounding Influences on Personality?

- What is meant by 'childhood determinism'?
- The factors which are considered in the category of environmental conditioning?
- The cultural values which influence personality?

The Supervisor's Role as to Basic Human Needs?

- The physiological needs of the human being, especially as developed by Maslow? Relate them to your association with fellow workers.
- What is meant by and included in other human needs such as safety, social esteem, and self-realization?
- The supervisor's role in the 'need' hierarchy?

What is Motivation and Results From a Lack of It?

- Some of the general patterns of employee behavior when there is a lack of motivation as the first step in overcoming this problem? Consider situations where you can motivate yourself and your associates.

The Conclusions Reached in Motivation Studies of Authority Versus Human Relations?

- The basic theories of McGregor and their purpose?
- The different perspectives on employee motivation between managers and employees?
- What can and what cannot be learned as a positive aid to employee motivation?

The Supervisory Approaches?

- The modern approaches to employee motivation? Observe and think about examples of them in your organization?

* * * * * * * *

Have an idea on what to look for? Turn to Chapter 4 in your text and read it now.

THE MANAGER AND MOTIVATION

Assigned Text Reading:
Chapter 4, Motivation and Supervision

This section deals with motivation. But one cannot look at motivation in a vacuum. You, as a supervisor, are concerned about the motivation of people—yourself, your employees, the others with whom you interact. So, in order to understand the behavior of others, you should look at human behavior. Consider these aspects:

1. Each person has his or her own reasons which determine their actions. These reasons may not be reasonable, or even obvious to others. But they exist, nevertheless. These reasons may be totally different from YOUR reasons, but they are often equally valid. (An employee may value the challenge of solving a problem, while you value having the problem solved so the utility is able to continue functioning).
2. Each person acts both according to his or her perception of the situation and his or her self perception. This affects both WHAT they do and HOW they do it.
3. People also act according to the way they are, as individuals, and according to their surroundings.

Some managers have been known to feel that if they could adequately motivate their employees, nothing could go wrong. That is quite an overstatement, but high motivation is certainly desired by most supervisors. At least most supervisors want high motivation toward the supervisor's goals.

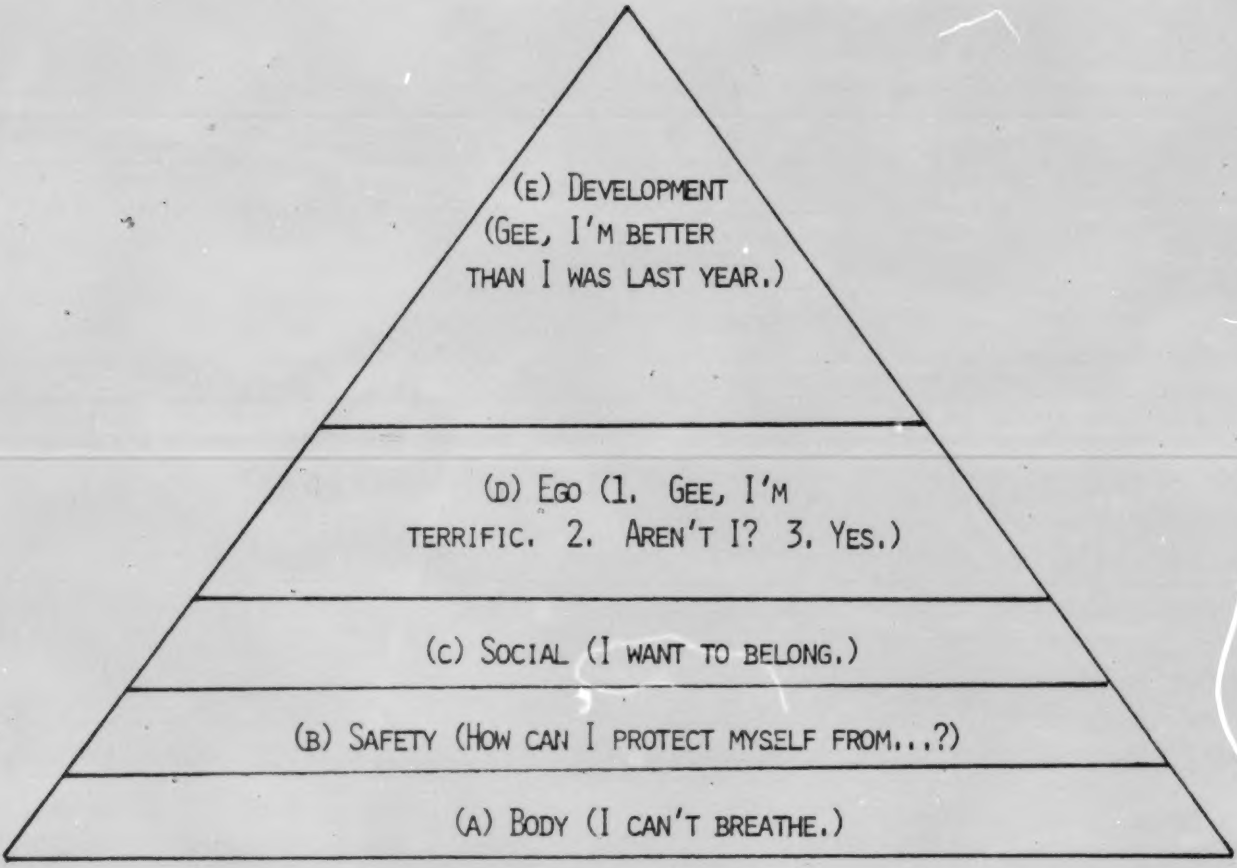
KEY POINTS

Personality

The text brings out a number of characteristics which influence a person's personality. These include physiological characteristics, childhood experiences, one's immediate environment, and even the culture surrounding the individual. The group that the individual associates with is not explored in the text, but this too plays a major role in the development of personality. Furthermore, these values are often responsible for misunderstandings, since two people from the same culture often have unrecognized, but widely different values.

Human Needs

The hierarchy of needs appears as one of the important areas in the study of the individual. Professor Maslow ranked human needs as follows, starting from the most necessary: 1) basic physiological needs, 2) safety, 3) attention, 4) esteem, and 5) self realization. Robert Townsend, in his book, Up the Organization*, provided concise examples of these needs:


(E) DEVELOPMENT (GEE, I'M BETTER THAN I WAS LAST YEAR.)
(D) EGO (1. GEE, I'M TERRIFIC. 2. AREN'T I? 3. YES.)
(C) SOCIAL (I WANT TO BELONG.)
(B) SAFETY (HOW CAN I PROTECT MYSELF FROM...?)
(A) BODY (I CAN'T BREATHE.)

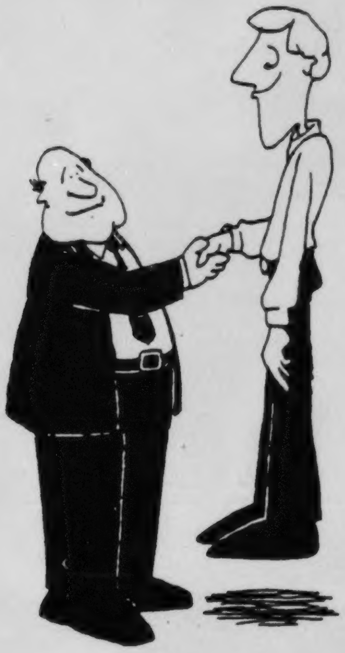
---

*Robert Townsend, Up the Organization, Greenwich, Connecticut, Fawcett Publications, 1970. pp. 119-123.

Maslow's 'hierarchy' is arranged to illustrate the various need-satisfaction levels. If the body's basic survival needs are not met, then the higher needs of ego and development are not required. BUT, when the lower echelon needs have been basically fulfilled, the spotlight turns to those upper needs. Think about it. Most positions in the water or wastewater area certainly provide for the basic body, security and even social needs. The individual, to be additionally motivated, should have tasks which provide for additional personal improvement with some ego-building in the process. The basic biological needs include such things as food, water, shelter, and other physical necessities. The higher or final categories of needs, according to Maslow, tend to overlap but are still distinct needs of the human being.

The human needs as expressed by many employees of the water and wastewater industry include: more time off, better income protection, retirement income, employee services, job upgrading programs, and better working conditions including improved on-the-job safety. As the gap between the wage scales for municipal and private employees narrows, union interests will turn to needs higher than the physiological needs satisfied by a paycheck. Improvement in income protection, retirement income, and on-the-job safety fringe programs offered by the employer and demanded by employees will gradually satisfy the second level of safety and security needs. There will be an increasing effort to provide more of the higher needs of the individual (social, self-respect, and self-fulfillment) which are related to the feelings of recognition, achievement, status and a sense of accomplishment.

Satisfying the needs for safety or attention appears to be obvious, but suprisingly, some managers have been impressed when they started paying attention to these needs. Newsletters, especially in large systems where employees might get "lost in the shuffle" are a valuable addition to an employee's attention or esteem need. This is particularly true if the news items report on recreation programs, weddings, births, deaths, training programs, promotions, vacations, retirements, community activities, and other relevant news items.



Motivation does not necessarily have to include monetary compensation.

What Do You Like About Your Job?

Look over the following list and put a '1' by the aspect of your job which pleases you the most. Continue by selecting the aspect which you prefer second best and give that a '2' until you have chosen the 5 top things which you like most about your job. If you can not choose between two items, you are permitted to have a tie.

_____ a. Adequate pay
_____ b. Usual benefits and fringe aspects
_____ c. Congenial co-workers and employees
_____ d. Much independence as to work performed and time allocations
_____ e. Interesting, challenging work
_____ f. Secure work and steady employment
_____ g. Comfortable working conditions
_____ h. Recognition for work well-done
_____ i. Good promotional aspects
_____ j. Highly respected job title
_____ k. Competent, fair supervisor
_____ l. Informed about happenings in the organization

Compare your responses to those of both managers and employees as noted in your textbook on page 64. Isn't it amazing how we can know that one aspect of our job pleases us, yet believe that another aspect, totally different, really rates highest for our co-workers? Sometimes this is true--you might rank a creative challenge highest while another employee cites the social interaction as number one. But, often, people are more the same than in suspected.

On the following pages, you will find a questionnaire which you might want to take yourself, as well as giving it to your employees.

MOTIVATION FEEDBACK OPINIONNAIRE *
PART I

Directions

The following statements have seven possible responses.

Strongly Agree	Agree	Slightly Agree	Don't Know	Slightly Disagree	Disagree	Strongly Disagree
+3	+2	+1	0	-1	-2	-3

Please mark one of the seven responses by circling the number that corresponds to the response that fits your opinion. For example: if you "Strongly Agree, circle the number "+3."

Complete every item. You have about 10 minutes to do so.

1. Special wage increases should be given to employees who do their jobs very well. +3 +2 +1 0 -1 -2 -3
2. Better job descriptions would be helpful so that employees will know exactly what is expected of them. +3 +2 +1 0 -1 -2 -3
3. Employees need to be reminded that their jobs are dependent on the Company's ability to compete effectively. +3 +2 +1 0 -1 -2 -3
4. A supervisor should give a good deal of attention to the physical working conditions of his employees. +3 +2 +1 0 -1 -2 -3
5. The supervisor ought to work hard to develop a friendly working atmosphere among his people. +3 +2 +1 0 -1 -2 -3
6. Individual recognition for above-standard performance means a lot to employees. +3 +2 +1 0 -1 -2 -3
7. Indifferent supervision can often bruise feelings. +3 +2 +1 0 -1 -2 -3
8. Employees want to feel that their real skills and capacities are put to use on their jobs. +3 +2 +1 0 -1 -2 -3
9. The Company retirement benefits and stock programs are important factors in keeping employees on their jobs. +3 +2 +1 0 -1 -2 -3
10. Almost every job can be made more stimulating and challenging. +3 +2 +1 0 -1 -2 -3
11. Many employees want to give their best in everything they do. +3 +2 +1 0 -1 -2 -3

---

*Jones, John E. and Pfeiffer, J. William. The 1973 Annual Handbook for Group Facilitators, 1973, University Associates Publishers, Inc., 7596 Eods Avenue, La Jolla, California 92037. pp. 43-45.

12. Management could show more interest in the employees by sponsoring social events after-hours. +3 +2 +1 0 -1 -2 -3

13. Pride in one's work is actually an important reward. +3 +2 +1 0 -1 -2 -3

14. Employees want to be able to think of themselves as "the best" at their own jobs. +3 +2 +1 0 -1 -2 -3

15. The quality of the relationships in the informal work group is quite important. +3 +2 +1 0 -1 -2 -3

16. Individual incentive bonuses would improve the performance of employees. +3 +2 +1 0 -1 -2 -3

17. Visibility with upper management is important to employees. +3 +2 +1 0 -1 -2 -3

18. Employees generally like to schedule their own work and make job-related decisions with a minimum of supervision. +3 +2 +1 0 -1 -2 -3

19. Job security is important to employees. +3 +2 +1 0 -1 -2 -3

20. Having good equipment to work with is important to employees. +3 +2 +1 0 -1 -2 -3

Now turn the page to see how you scored. . . .

MOTIVATION FEEDBACK OPINIONNAIRE
PART II

Scoring

1. Transfer the numbers you circled in Part I to the appropriate places in the chart below:

STATEMENT NO.	SCORE	STATEMENT NO.	SCORE	STATEMENT NO.	SCORE
10		6		5	
11		8		7	
13		14		12	
18		17		15	
	*****		*****		*****
Total (Self-Actualization Needs)		Total (Esteem Needs)		Total (Belonging Needs)	

STATEMENT NO.	SCORE	STATEMENT NO.	SCORE
2		1	
3		4	
9		16	
19		20	
	*****		*****
Total (Safety Needs)		Total (Basic Needs)	

2. Record your total scores in the chart below by marking an "X" in each row next to the number of your total score for that area of needs motivation.

	-12	-10	-8	-6	-4	-2	0	+2	+4	+6	+8	+10	+12
Self-Actualization													
Esteem													
Belonging													
Safety													
Basic													

Once you have completed this chart, you can see the relative strength of your use of each of these areas o: needs motivation.

There is, of course, no "right" answer. What is right for you is what matches the actual needs of your employees and that, of course, if specific to each situation and each individual. In general, however, the "experts" tell us that today's employees are best motivated by efforts in the areas of Belonging and Esteem.

Motivation Versus Maintenance

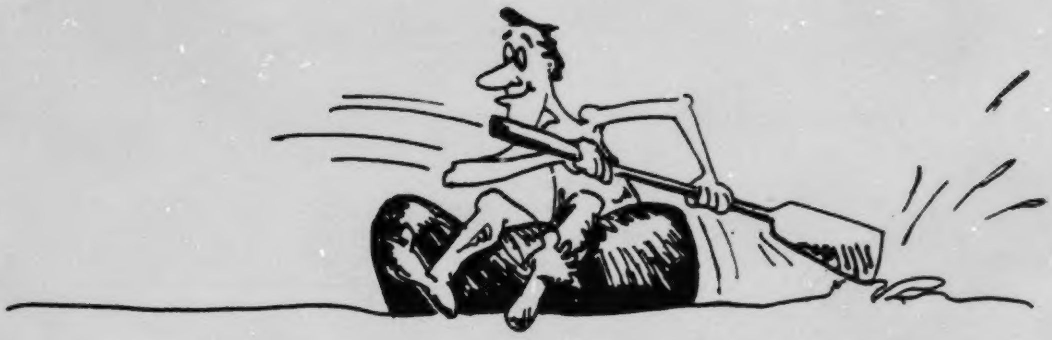
It may sound like a contradiction to state that certain aspects which DISSATISFY employees will not necessarily serve to motivate employees if those aspects are satisfied. However, it might help to view the situation as a cutaway view of a lake. The person who is underwater is uncomfortable (to say the least). But, the abilities needed to swim to the surface of the water and remain there are different from the skills needed to get above the surface of the water onto either land or in the air. The maintenance aspects are those below and up to the water's surface. The motivational aspects are those above. You will notice that the most basic of Maslow's need categories fall into the maintenance areas, while the higher levels of the need hierarchy constitute the motivational factors.

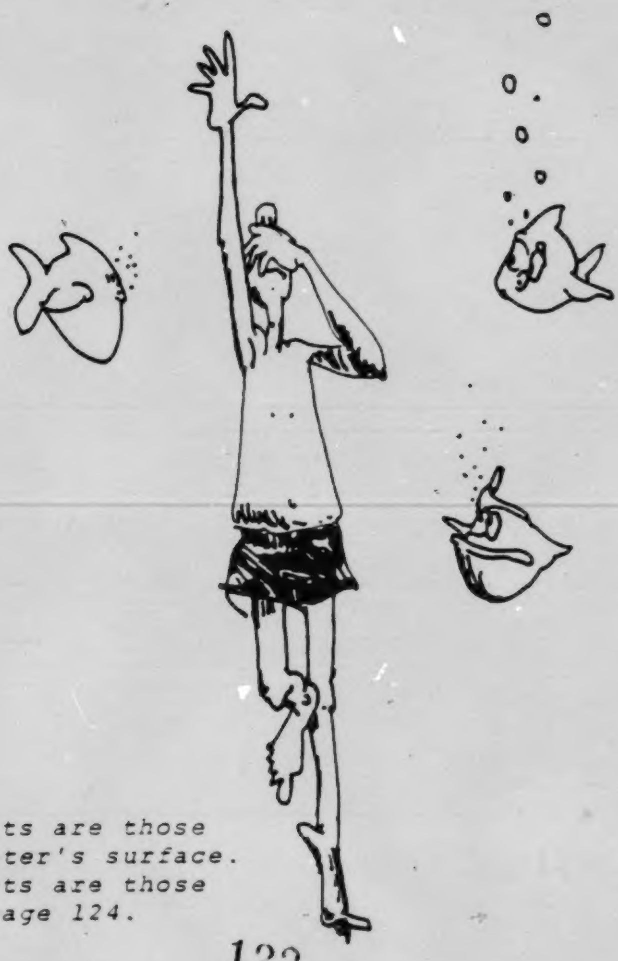
These are some of the aspects included in motivational factors:

1. Responsibility: providing growth and development for employees.
2. Achievement: creative challenge, with the opportunity for success, of failure.
3. Work Itself: the aspects of the task at hand, and the challenge provided to the employee.
4. Recognition: opportunity for the employee to fulfill EGO needs.

You notice that these tend to relate to the topmost stages of Maslow's hierarchy--ego and personal development.

THE LAKE CONCEPT





"The maintenance aspects are those below and up to the water's surface. The motivational aspects are those above." Lesson Two, page 124.

Maintenance factors include such aspects as:

1. Working Conditions: adequate protection and comfortable surroundings for the employee.
2. Job Security: so that the employee's productivity is not curtailed by unnecessary worry about keeping the job.
3. Supervision: aspects which pertain to fairness, competence, and adequacy of supervision.
4. Company Administration and Personnel Policies: again, the aspects of competence, fairness, and rules and regulations which allow the employee to handle tasks at hand.

These factors generally tend to refer to the lower needs in the hierarchy--body, security, and social.

Theory X Versus Theory Y

Labeling these two theories in such an abstract fashion might be distracting for you. Perhaps it helps to think of a road sign, where a big "X" is drawn across the sign--indicating that something is not to be done. This tends to illustrate the Theory X approach--one of stern authority with accompanying rules and regulations. You might also call this Theory X approach that of the autocratic or directive.

You should realize that these two theories are extremes--opposite ends of the pole and probably unrealistic in terms of actual people. You may find bits and pieces of your own orientation in both of these theories. However, take note of the statement in the text which says, "the things which tend to motivate people more today are primarily related to themselves." The statement, basic in its orientation, seems to sum up employee motivation.

The manager who is aware of the motivational aspects which he or she appreciates about the job is in a position to understand more about the aspects that motivate employees. Overcoming and discarding some assumptions which may be inaccurate is the first step; uncovering the actual motivators of the employees being supervised is the second step. Providing more of those motivational factors is the third step.

Look at some of the aspects of the manager who operates via Theory X. Examine this comparison between the Theory X style versus the Theory Y style. You notice that there are advantages to both styles.

Theory X	Theory Y
(Autocratic, Authoritarian, and Directive)	*(Participative)*
ADVANTAGES	**ADVANTAGES**
1. Immediate action.	1. Shared leadership encourages group motivation.
2. Centralized control.	2. Builds confidence.
3. Fast decisions.	3. Employee growth is encouraged (expertise).
4. Initial work usually accomplished.	4. Develops employees (responsibility).
RESULTS	**RESULTS**
Short term: Good to Excellent	Short term: Generally Unimpressive
Long term: Generally Unimpressive	Long term: Poor to Excellent
APPROACH	**APPROACH**
1. Boss "tells" employees what to do (the "how" aspect).	1. Boss consults with or delegates tasks to employees (the "why" aspect).
2. Direct approach--tight control.	2. Often indirect approach--control less rigid.
3. Often one-way communication.	3. Usually two-way communication.
DISADVANTAGES	**DISADVANTAGES**
1. Leadership and incentive among employees stifled.	1. Not as speedy or direct in short run or immediate goals, but usually proves most effective approach in long run because employee incentive and ability is developed.
2. Misunderstandings occur due to one-way communication.	2. Depends on employee ability (the chain is as strong as its weakest link).
3. Abilities of staff underutilized.	3. Leadership depends on communication and results require teamwork.
4. Things tend to "fall apart" if leader leaves.	
5. Boss often overworked.	
6. The gains accomplished through use of this approach in the short run do not carry over into the long run since employee incentive and morale are not developed.	

Managerial Grid

Several extremes have been explained in this lesson: Theory X versus Theory Y; Motivational aspects versus Maintenance aspects. The managerial grid also includes extremes: a concern for Production (or getting the job done) versus a concern for People (including all aspects which make the employee's job a desirable one). However, unlike the other extremes, a manager is able to rank high in BOTH of these concerns--they are NOT mutually exclusive. Look over the grid explanations carefully in your text (pages 61-62) and rank yourself as a manager.

Means to Increasing Employee Motivation

There are several approaches to supervision that are based on the modern theories of motivation. These approaches include: delegation of authority with responsibility, job enlargement and job enrichment, participation, and management by objectives. You should pay particular attention to these approaches because they have been found to be very effective. A brief comment relating each approach to the water/wastewater field may help you in utilizing the approaches.

DELEGATION: A supervisor of a water or wastewater system could give general directives to the operators but delegate the authority for each operator to perform the specific tasks.

JOB ENLARGEMENT AND JOB ENRICHMENT: A supervisor of treatment plant operators could enlarge the scope and importance of the operator's job by rotating operators, by increasing responsibilities to include writing operating procedures, training new operators, evaluating new procedures, or conducting plant tours.

PARTICIPATION: A supervisor of a treatment plant could seek advice, suggestions, and information from the operators regarding, for example, improving operating procedures, laboratory procedures, laboratory equipment, maintenance programs, personnel assignments, safety conditions or safety practices. The operators would feel that they have significant influence on the decisions, and might be, therefore, more willing to accept the decisions.

MANAGEMENT BY OBJECTIVES: A supervisor of a treatment plant might ask each operator to write down certain goals and objectives which the operator would like to accomplish during the coming three months, six months, and full year. For example, an operator might have as goals: completion of a training course or more education, read selected manuals of practice, write selected operating procedures, recommend a maintenance schedule, train a new employee, or solve a specific problem between two subordinates.

Step by Step Motivation

A program to improve motivation is defined by James M. Abbett as consisting of the following two basic steps:

The first step in the motivational program is for the organization to set forth policies and rules to govern the program. A suggestion would be as follows:

1. Develop in each employee an awareness of his personal contribution to the organization and instill a conscious desire in him to do each and every job right the first time.
2. Increase the overall effectiveness of the suborganizations with respect to their daily activities (such are budget controls, schedule performance, and employee morale).
3. Implement a broad and continuing program that will make the utility more efficient, safer, and dependable.

The second step is the establishment of a set of ground rules within the framework of the policy established:

1. Have a vigorous and explicit identification of top management and senior officials with objectives and activities of the motivational program.
2. Maintain a specific organization with clear-cut responsibility and authority for coordinating and directing the activities.
3. Promote a program that will provide for a continuing emphasis throughout the entire organization and, to the extent feasible, among the principal subcontractors and activities.
4. Set objectives that reflect the needs and goals of the organization and their fulfillment so as to meet the related and often identical purposes of the organization's customers.
5. Establish procedures and practices for the documentation and verification of program achievements.
6. Emphasize the need for interchange of program ideas throughout the organization and related organizations.
7. Relate organization goals to employee self-interest by means of a specific program and work to build these attitudes in personnel at all levels throughout the organization.*

---

*Abbett, James M., "Improving Workmanship and Reducing Costs," Journal, American Water Works Association, Volume 63, No. 7, July 1971, p. 934.

REVIEW

What is your motivation for taking this course? Is it the CEU's, or that Certificate? Is it your supervisor? Your hopes for a higher position? Or, maybe basic curiosity about management? Regardless of your motivation in taking this course, this section has provided you with some ideas for achieving motivation in those you supervise. And it possibly provided you with some additional insight into your own motivation.

Run through the Mini-Review for this Section, page #135.

FUTURE REFERENCE

Abbett, James M. "Improving Workmanship and Reducing Costs," Journal, American Water Works Association, Vol. 63, No. 7, July 1971, pp. 393-395.

The area of "motivational techniques" requires a few words of explanation concerning the needs of the average worker. Understandably, his first need is for those things that allow him to survive as a human. Beyond them, he looks for ways to advance and to improve his social position or status.

Batchelor, Robert B., "Safety for Water Utilities," Journal, American Water Works Association, Vol. 69, No. 9, September 1977, pp. 477-481.

"What is safety? It is simply the organized use of common sense, good judgement, and safe practices," reports Batchelor. "A municipal utility, like an industry, cannot afford not to have a good safety program."

Becker, Harry W. "Safety Beyond the Law," Journal, American Water Works Association, Vol. 65, No. 7, July 1973, pp. 461-463.

"Safety is a state of mind, and to put the employee in the proper framework to carry out his duties without an accident it is necessary for the manager to fulfill seven needed elements of a good safety program. These seven elements are:

1. management leadership
2. policy and responsibility
3. maintenance of safe working conditions
4. establishment of safety training
5. an accident record system
6. a medical and first-aid system
7. acceptance of personal responsibility by employees."

Are each of these elements in your organization motivated toward safety?

Binford, Charles W. "Motivating for Safety," Journal, American Water Works Association, Vol. 61, No. 2, February 1969, pp. 57-59.

Motivating employees to change their habitual attitudes toward safety programs is often the core of a successful continuing safety campaign.

Binney, Mel C. "Hidden Costs Finance Effective Safety Programs," Journal, American Water Works Association, Vol. 65, No. 7, July 1973, pp. 448-452.

"Safety is an area where many water-utility managers are 'penny wise and pound foolish.' A dollar invested in accident prevention should reap several-fold savings--on the basis of the true cost of accidents."

Blake, Robert R. and Mouton, Jane S. The Managerial Grid, Houston: Gulf Publishing Company, 1964.

Haas, Gerald P. "Guess Who's Coming to Inspect?" Journal, American Water Works Association, Vol 69, No. 6, June 1977, pp. 312-313.

"Even after rigorous efforts by one utility to ensure its compliance with OSHA, OSHA inspections resulted in a list of twenty violations of safety regulations, three conditions requiring correction, and two special orders."

At this rate, motivating for safety becomes a NECESSITY.

Hogsett, Ordie L. "Toward Proper Safety Attitudes," Journal, American Water Works Association, Vol. 65, No. 7, July 1973, pp. 472-473.

"For some reason, men find it difficult to accept their frailness. Accidents, it is reasoned, happen to others. A good accident-prevention program with emphasis on education, can make the employee understand the value of careful working habits."

Husten, Howard G. "Meeting Modern Safety Standards," Journal, American Water Works Association, Vol 65, No. 7, July 1973, pp. 453-460.

"Every supervisor should be a safety director! Helping the first-level supervisor to develop safety skills should be the main thrust and goal of the utility's program."

Jacobs, Harold C. "Accident Prevention and OSHA," Journal, American Water Works Association, Vol 65, No. 7, July 1973, pp. 468-471.

"An effective safety program must involve both the management and the employees...The advantages of such a program include safety for the personnel involved and increased savings for management."

Townsend, Robert. Up the Organization: How to Stop the Corporation from Stifling People and Strangling Profits, Greenwich, Conn., Fawcett Publications, 1970.

MINI REVIEW: SECTION 2

Complete for your own benefit....(answers at bottom of page)

_____ 1. A person's physiological makeup refers to his

a. income, education, and employment
b. childhood incidents
c. biological composition, such as race or height
d. cultural background

_____ 2. An individual wants to feel a part of a group. This is viewed as

a. a social need
b. a self-realization need
c. an esteem need
d. a physiological need

_____ 3. In the survey between workmen (employees) and foremen (supervisors), the employees rated good wages as how important?

a. first
b. third
c. fifth
d. last

_____ 4. Management by objectives means management by results, or when targets are set by the employees and then the results are evaluated by the employees.

a. true
b. false

_____ 5. Using management by objectives, the employee usually sets a stricter evaluation out for himself than the employer would do.

a. true
b. false

How did you do? Great, we hope. If so, go on to the test portion. When you complete both the Objective and Subjective portions of the test, you will have completed Lesson Two......

* * * * * * * * * * *

ANSWERS: 1) c 2) a 3) c 4) a 5) a

TEST TWO INTRODUCTION

Having completed the second lesson's reading assignments, you're ready to take the second test portion. Once again, the purpose of the test portion is to see how well you understand the material and whether or not you're able to apply the important concepts. We have again included comments from students previously enrolled in the course. Are you beginning to see similarities between your role as manager and the situations Wilbur faces?

"The subjective portion gets you thinking more and wondering if you have made the right decisions in the past." JC

"The subjective portion was very good for me. I've been in middle management for four years and this still is the hardest part of the job." ROJ

"The former chief operator at our purification plant was exactly like Mr. Whipple. When he retired after 35 years of service, no one was able to do a lot of the work because they had never been taught how. I became a superintendent during this period and had to train a new chief operator to do even minor maintenance. Once this person was competent, I assigned to him the responsibility of training the other operators. Now, after five years, all the operators can assume and complete almost any task in the plant. The result has been an overall improvement in operating and work conditions. Employee turnover, which was the highest in the entire city organization, has been reduced to practically zero. Every operator can do the laboratory work. Every operator is also certified and I'm getting a lot more sleep than I was!!" HLF

"The delegation of authority problem of John Whipple's is exactly like one which occurred with this district. The problem was solved through counseling." FJB

"I found Part I and Part II of the subjective portion very challenging. The problems really made me dig into the text and workbook... I found everything well explained and helpful." SB

"The evaluation of the two cases in the subjective part was the most interesting to me. It was also the most time consuming, but I feel it helps to provide actual training." PRB

"A former employee of mine had a motivation problem. He had total disregard for his job and lack of respect for me. I talked with a number of his other employers and heard complaints from my employees about the same problem. He was asked about the problem and stated to me that he didn't care one way or the other about his job or the company. He resigned shortly afterward." DDT

"Two down and five to go!" DEW

NAME____________________

Answer Sheet
Lesson Two
To Be Sent In

LESSON TWO

SUPERVISORY MANAGEMENT IN THE WATER AND WASTEWATER FIELD

I. Objective Test for Lesson Two---complete this section
II. Subjective Portion
    Part I. Delegation Problem
    Part II. Motivation Problem

STUDENT'S NAME______________________________

ADDRESS___________________________________

____
CITY STATE ZIP

Even though this will be returned very shortly to you don't wait to get started on the next lesson. Remember that motivation that you possess (hopefully) and keep on moving.

Finished? Then just send this to:

Self Study Course Coordinator
432 Eppley Center
Michigan State University
East Lansing, MI 48824

OBJECTIVE ANSWER SHEET
(circle the correct answer)

1. a b c d
2. a b c d
3. a b c d
4. a b c d
5. a b c d
6. a b c d
7. a b c d
8. a b c d
9. a b c d
10. a b c d
11. a b c d
12. a b c d
13. a b c d
14. a b c d
15. a b c d

	PASSING		NOT PASSING
Objective Test Score			
Number Right:	15 14	13 12 11	10 9 8 7 6 5 4 3 2 1 0
Subjective Portion			
Part I	Superior	Satisfactory	Not Satisfactory--Do Over
Part II	Superior	Satisfactory	Not Satisfactory--Do Over

Note: BOTH the Objective Test and the Subjective Portion must fall into the Passing category for you to receive credit for this lesson. If either or both parts are NOT acceptable, please rework that part to receive credit. IF YOU HAVE ANY QUESTIONS, PLEASE DO NOT HESITATE TO WRITE IMMEDIATELY.

OBJECTIVE TEST: LESSON TWO

(Place answers on the sheet provided preceding questions)

Here is the second test to be sent in. You are to complete this test as you did the first test. There is a subjective portion for this test as well, which presents a problem-solving situation. This covers both Section 1 and Section 2.

1. A decentralized organization, in terms of delegation, is one where:

   a. delegation extends from the highest to the lowest managerial level.
   b. as little delegation as possible has taken place.
   c. delegation is prevalent on the upper levels but is not evident on the lower levels.
   d. the work of the organization takes place in at least two buildings so there is no one central place.

2. A manager's authority comes:

   a. with the position
   b. with the person
   c. only from the power which subordinates allow the manager to have
   d. only as the manager applies disciplinary measures

3. Closely supervised employees are generally:

   a. more highly motivated because their tasks are so closely watched.
   b. often less motivated because their initiative has been somewhat removed.
   c. less likely to be dissatisfied with their job because fewer mistakes get made.
   d. the only way a manager is able to keep control over the operations which are his/her responsibility.

4. The managerial approach which is very autocratic and authoritarian is:

   a. Theory X
   b. Theory Y
   c. Theory Z
   d. Maslow's Theory

5. Recognition for work well done is a prime example of a maintenance factor.

   a. True
   b. False

6. The step in training where YOU do the showing is termed the ____________ step.

   a. detailed explanation
   b. demonstration
   c. discussion
   d. drill

7. Delegation of authority means:

   a. granting enough power to subordinates so that they may perform within certain limits.
   b. delegating tasks which require the employee to carry a managerial title.
   c. giving employees tasks which require managerial skill but not technical skill.
   d. giving employees the power to take disciplinary actions over their co-workers.

8. Blake and Mouton have developed a managerial grid which illustrates two managerial concerns, __________ and ____________.

   a. people and poverty
   b. production and profits
   c. people and production
   d. profits and poverty

9. Motivational factors tend to relate to the prime human needs of body and security.

   a. True
   b. False

10. The psychologist who developed the concept of a hierarchy of the five human need areas is:

    a. B. F. Skinner
    b. A. H. Maslow
    c. Fred Herzberg
    d. Doug McGregor

11. The behavioral study area which concentrates on the individual effects of one's experiences in the earliest years of life is termed:

    a. cultural values
    b. environmental impact
    c. childhood determinism
    d. physiological factors

12. The manager whould consider delegating a task which he or she enjoys but which could also be adequately done by a subordinate.

    a. True
    b. False

13. Participative management means that:

    a. the manager makes no decisions in the final outcome.
    b. workers have the opportunity to express their opinions and the manager uses their insight to aid decision-making
    c. workers provide service but their opinions are of no importance.
    d. the manager chooses the workers who will participate in the managerial aspects of the job.

14. The appropriate image of a supervisor is that of the manager working right alongside the subordinates on the same task.

    a. True
    b. False

15. In delegation, the manager should pay attention to which of the following aspects?

    a. the job and the people
    b. the job
    c. the job, people, and delegation
    d. the job, people, delegation, and timetable of completion.

This is the end of the *Objective* *Test. Go right on to the Subjective Portion.*

NAME__________________________ Lesson Two
Subjective Portion
To Be Sent In

SUBJECTIVE PORTION, PART I.

Part I. Motivation Problem

Wilbur has uncovered several indications which seem to suggest low employee morale and motivation at the River City Utility. You are to examine the situation and provide some suggestions for helping to solve the problem of low motivation. Complete this Part I as follows:

A. List these indications (as many as you are able to find).

B. Provide Wilbur with a list of suggestions to use in overcoming the low morale or motivation there, based on the indications you have listed.

Use the remainder of this sheet and add additional pages if needed.

NAME_________________________

SUBJECTIVE PORTION, PART II.

Part II. Delegation Problem

Wilbur has a problem in teaching John Whipple to delegate authority. Read over the Case again in Section 1. Describe and solve Wilbur's delegation problem according to the following steps. *Use this sheet (front and back) and add additional sheets as needed.*

A. DESCRIBE WILBUR'S PROBLEM WITH WHIPPLE.

B. SOLVE THIS PROBLEM THROUGH THE FOLLOWING STEPS:

1. List all the alternatives which could be used in clearing up this problem of delegation in the utility system.
2. Analyze and evaluate each alternative as to its desirability. (Be sure to include possible positive and negative consequences).
3. Describe your recommendations. (These may center around one or more of the above alternatives).

NAME ______________________________

Lesson Two
Evaluation Sheet
To Be Sent In

EVALUATION SHEET - LESSON TWO

Please take just another minute to complete this evaluation sheet. YOUR ANSWERS HERE WILL PROVIDE US WITH YOUR OPINION OF THIS LESSON, and are one of the prime means that we have for improving the course. We really appreciate these evaluations and comments.

1. How accurate and appropriate did you find the case example for Section One? (Circle the best answer or write your own)

   Very realistic — So-so, at least it did not turn me off — Basically inappropriate

   Other:

2. What about Section Two?

   Very realistic — So-so, at least it did not turn me off — Basically inappropriate

   Other:

3. What part of this lesson did you find most interesting?

4. What part did you find least interesting or dislike? (Please tell us why too)

5. How is the objective test going?

   Still too Hard — OK — Still Too Easy

6. What did you think of the subjective portion in this lesson?

7. Have you encountered a similar situation to the one in Section One or Two?
   NO Yes; could you briefly describe it?

8. Other comments?

LESSON THREE

The Supervisor's Need for Problem Solving and Communication Skills

Section 1: Problem Solving and Decision Making
Assigned Text Reading: Chapter 5

Section 2: The Communicating Manager
Assigned Text Reading: Chapter 6

> --An expanded communication program and the establishment of advisory boards from all levels of employees provide ways to improve communication and enhance the employee's identification with the utility.
>
> Robert J. McLeod, "Communication--Key to Effective Labor Relations," Journal, American Water Works Association, September 1976, p. 453.

LESSON THREE - SECTION 1

PROBLEM SOLVING AND DECISION MAKING

"Four o'clock and all is well," Wilbur glanced at the clock in his office. Thursday afternoon--another week almost gone, and still no replacement in sight for River City. However, Wilbur had to admit that he was not very anxious to leave. He had started several projects, and he rather wanted to be around when they were completed. He'd suggested bringing in a new sludge flow meter, and the operation of that equipment was going to require some different maintenance procedures. It might be difficult to get those new procedures going. Wilbur recalled a previous instance when he had been younger, much less experienced, and had, to be honest, goofed.

> Wilbur remembered he had just been placed in his first supervisory position at a well-established plant with seven older employees with an average of 25 years of experience. He had been confident that the technical knowledge he had acquired through his night school courses would be more than sufficient to handle the job. Wilbur did remember feeling a bit uneasy about his ability to get his ideas across. But he had decided that the role of supervisor would automatically get him the respect he needed to manage the crew successfully.
>
> Wilbur remembered the many ideas he had come up with for improving the utility. Right away he had suggested upgrading the sampling and testing procedures because the methods being used did not provide a true indication of the Biochemical Oxygen Demand. The results were used to calculate the service charge to the twelve industries for their waste treatment. Wilbur had calculated that $1500.00 in revenue was being

lost per month. That represented fifty percent of the monthly operating cost. He had felt really proud when his suggestions on upgrading had been taken and put into practice.

Wilbur recalled that two of the employees had accepted the new procedures, but the other five had been against the change. They had felt that Wilbur was trying to make their job more difficult. They figured Wilbur wanted to replace them with younger men nearer his own age. Wilbur had not realized the reasons for their resentment. In his enthusiasm for the project, he had not even explained his reasons for the change--figuring that the crew was there to follow his orders. He hadn't even noticed the change in the crew's attitude as he continued to upgrade the plant and plan improvements.

A week after the new procedures had been put into effect, the lift station pump motor had burned out. Two of the problem employees had refused to come in when they were called, even though they were in charge of maintenance. Wilbur remembered coming in and finding they had not even opened the new procedures book much less followed it.

Wilbur had acted fast. He had called the Chicago pump emergency number and ordered a new motor. But, the order could not be filled for three weeks. So, he had taken a portable pump to the lift station, placed the pump in operation and had spent the rest of the night pumping out the lift station to the main plant. Wilbur winced at the memory--it certainly was NOT a pleasant recollection.

By 8:00 that next morning, Wilbur had been properly furious. When the two employees who had refused to report during the night had come in, Wilbur had fired both of them on the spot. But little had Wilbur realized that this action only served to reinforce the belief of the other employees that he wanted to replace them all. Resentment against Wilbur had grown to the point where the three men who also had resisted the upgrading handed in their resignations in protest against the firing of their co-workers.

By this time, the utility had been operating with a minimum crew. Wilbur, aided by the other two employees, had to work around the clock just to keep the plant running. Gradually, Wilbur had become aware of the reasons underlying the resentment of the five employees who had been fired or who had quit.

That had been quite a humbling experience for Wilbur--even now the memory of his actions jarred him. But now, at the utility in River City, Wilbur felt he had an opportunity to use that past experience in a positive way. No, he was not going to let a similar situation occur here.

* * * * * * * *

Problem solving and decision making are required of all managers--under a variety of circumstances. This was an instance where Wilbur had been required to solve a problem brought on by certain decisions he had made. This course will require you to utilize a problem solving approach to many different types of problems--so give this section your close attention.

PROBLEM SOLVING AND DECISION MAKING

The subjective portion for Lesson One requested a list of some of the problems you have or expect to encounter. This lesson will discuss some problem-solving and decision making techniques. Recall some of the problems you have listed for Lesson One, and read on.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Responsibility of the Supervisor in the Development of Decision-Making Skills?

- The prescribed steps in the decision-making process? Consider how you would schedule a shutdown for maintenance of a piece of equipment.
- The extent of problem definition? If you are specifying a new item of equipment, know exactly what you expect from it.
- The steps in analysis of the problem?
- The process of developing alternative solutions to the problem?
- What is meant by 'evaluation of alternatives'?
- The factors aiding the supervisor in the selection of alternatives?
- The reasons for the follow-up and appraisal of the decision?

* * * * * * * *

Read the assigned text material now.

PROBLEM SOLVING AND DECISION MAKING

Assigned Text Reading: Chapter 5, Problem Solving and Decision Making

Decision making is no easy task. By definition, a decision or problem to be solved has at least two solutions, or a 'decision' would be unnecessary. The second section in Lesson Two is designed to acquaint you with the decision making process. At the conclusion of this section, before the Mini Review, you will find an outline on problem solving which summarizes the process.

KEY POINTS

The Decision Making Process

This process is composed of some very clear and definite steps. Reading through these steps may strike you as lengthy and too complicated when you know that on the job you are often required to make rapid judgments. Like other skills, it may be slow at first, but once you start practicing this process, it will not take as much time. Furthermore, as an efficient manager, you will find yourself with more time for the important matters.

I. Defining the Problem

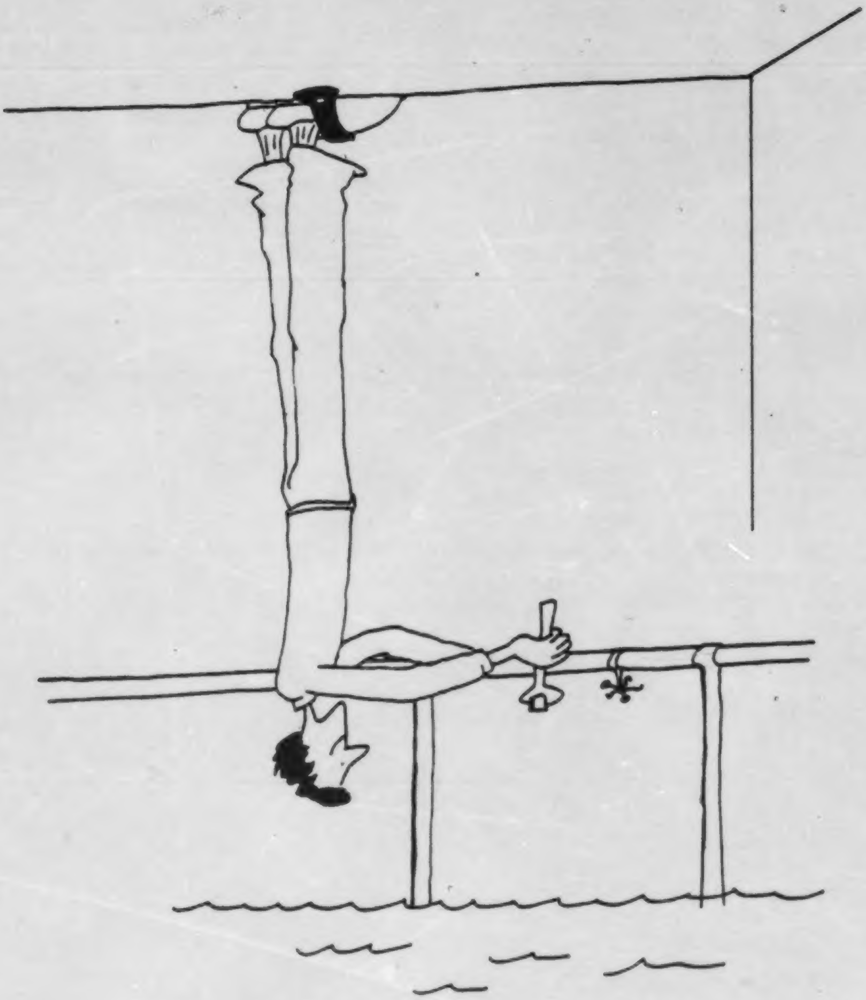
This step might be called the most important for several reasons. First, if you have not defined the problem correctly, you could end up solving the wrong problem and that would put you right back where you started (except that you will know what you do not want to solve, perhaps). Second, a correct definition of the problem often is a major key to its solution.

II. Analyzing the Problem

Once you have the problem in hand, the analysis starts with the facts. Not hunches, but the facts. What do you know--and what don't you know? Notice that word objective in the text. It is difficult sometimes to keep your opinions and biases out of your analysis.

III. *Development of Alternative Solutions to the Problem*

This is the step that is sometimes overlooked--or rushed through. Yet, this is also the step that may be most beneficial. There are two key points to keep in mind when developing alternative solutions. One, some alternatives may not be very obvious, and two--some of the alternatives may not be very desirable. But remember, your goal is to eventually arrive at a solution which provides the most desirable consequences while providing the fewest undesirable consequences.



Look for alternative solutions to problems

IV. *Evaluate All Alternatives to the Problem*

Evaluation of the alternatives includes more than just analysis of the consequences. Risk is often a major factor in decision making. So is timing, as the text notes. Even making what appears to be NO decision is a decision--and certainly should rank among every alternative solution.

The text lists a number of aids generally available to the decision-maker. Experience is usually touted as the primary aid--although, in a changing age, experience based on conditions which no longer exist can be a drawback as well as an asset. Seeking outside advice may be viewed as a form of extended experience--although, as noted in the book, acceptance of this advice is, in itself, another decision.

Basic analysis techniques include: questionnaires, interviews, work group discussions, charts, management audits, mathematical equations, work simplification, work measurement, forms design, systems and procedures, work sampling, PERT and CPM,* etc. These techniques can be applied in any water/wastewater utility.

Scientific decision-making tools, such as statistical decision analysis, decision trees, and computer models can also be useful to the managers of water/wastewater utilities. Admittedly, these approaches are generally more applicable for larger facilities where the organization may be more complex.

V. *Select the Alternative, Implement it, and Follow-Up the Results*

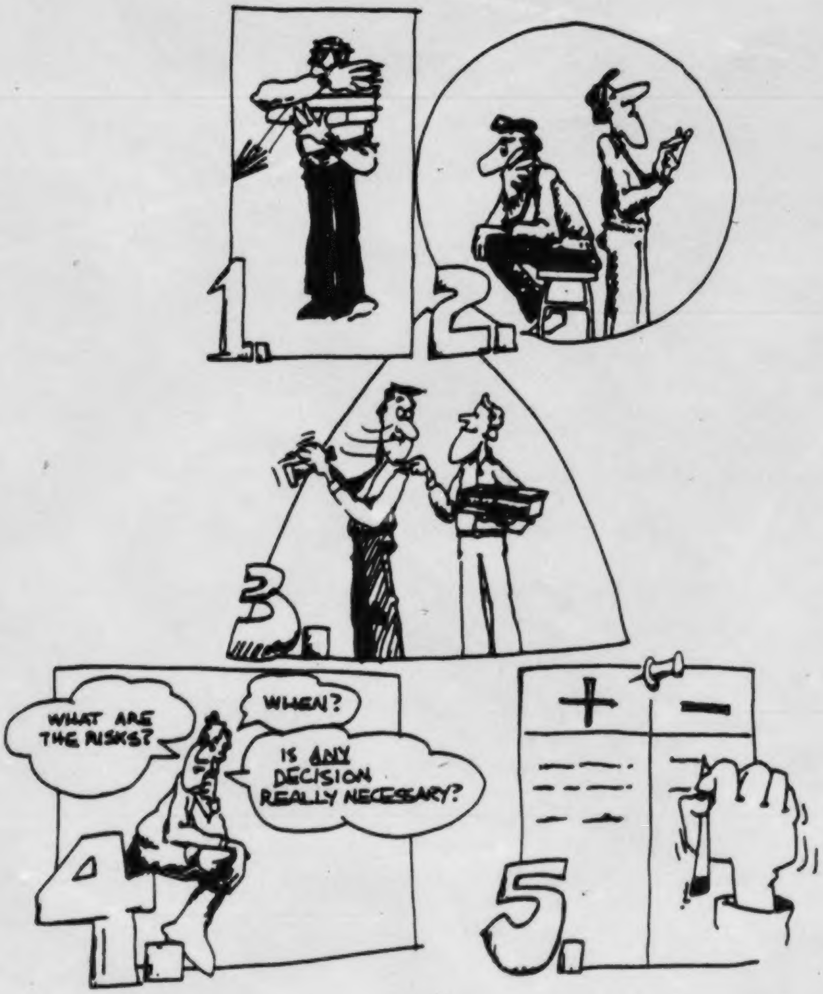
All problem solving situations should be evaluated after the decision is made. Not only does this provide experience for future decisions of a similar nature, it provides essential feedback on the outcome of the decision itself. If the decision made was not correct, catch the results as soon as possible and take the next logical step.

---

*PERT stands for Program Evaluation and Review Technique and is utilized for the control of time. CPM refers to Critical Path Method and is similar to PERT and is also primarily oriented toward better managerial control of time.

A good problem-solving method is something essential for each manager and supervisor to master—and use. To help you in initially using this approach, an outline of the Management-Systems Approach to Problem Solving follows. When you have read over this outline, look at the two examples which describe the process in more detail.

THE MANAGEMENT SYSTEMS APPROACH


1.
2.
3.
WHAT ARE THE RISKS?
WHEN?
IS ANY DECISION REALLY NECESSARY?
4.
+
−
5.

1. *Start with the facts.*
2. *Analyze the problem.*
3. *Develop alternative solutions.*
4. *Evaluate all alternatives.*
5. *Evaluate the results.*

MANAGEMENT-SYSTEMS APPROACH TO PROBLEM SOLUTION

by Omar Keith Helferich

I. DEFINE PROBLEM AND OBJECTIVES

A. Define Assignment

1. Reason for study--definition of a problem
2. State expected benefits from solving the problem

B. Plan and Schedule

1. Define tasks of study
2. Estimate financial and manpower needs
3. Assign tasks to individuals
4. Develop schedule

II. SUMMARIZE MANAGEMENT ASSUMPTIONS

A. Define the Possible Alternatives

B. Define Criteria to Be Used in the Evaluation of Alternatives

1. Impact on costs
2. Impact on customer service
3. Impact on employee motivation
4. Impact on public relations
5. Impact on balance of overtime pay
6. Impact on quality of effluent, etc.

III. SOLUTION DEVELOPMENT APPROACH

A. Select the Basic Analysis Technique. Select the Appropriate Technique from:

1. Questionnaire
2. Interview
3. Work group discussion or meeting

4. Organization chart
5. Process chart
6. Communications audit
7. Mathematical equation
8. Management audit
9. Other

B. Describe Specific Technique

1. Develop specific questionnaire
2. Determine areas to cover in interview
3. Develop agenda for work session
4. Etc.

C. Check Appropriateness of Technique

1. Review questionnaire after completion for clarity of questions, time to complete, usefulness of data if completed, etc.
2. Review the interview format developed to determine the likelihood that it will provide the desired information.
3. Review the developed agenda for the meeting and the personnel who will attend to determine the likelihood that the work session will generate the desired information.
4. Etc.

IV. EVALUATE ALTERNATIVES AND RECOMMEND A COURSE OF ACTION

A. Utilize Technique

1. Use questionnaire
2. Conduct interview
3. Conduct work session
4. Etc.

B. Analyze and Evaluate Results for the Proposed Alternatives
    1. Analyze results of completed questionnaire
    2. Analyze results of interview(s)
    3. Analyze results of work session
    4. Etc.

C. Select and recommend best alternative
    1. Consider impact on individuals directly involved
    2. Consider impact on all personnel of the organization or group
    3. Consider the impact on cost, revenue, service, etc.

V. IMPLEMENT RECOMMENDATION
    A. Develop Implementation Plans and Schedule
    B. Take Action--Implement Decision
    C. Perform Follow-up and Re-evaluation After Decision

WATCH OUT FOR THESE "PROBLEMS" IN YOUR PROBLEM SOLVING TECHNIQUE:

1. Failure to determine desired outcome (what is your objective?).
2. Not laying out the problem in detail on paper (this brings on a tendency to skip over some issues).
3. Consideration of really only one alternative.
4. Selecting alternatives without fully regarding the outcome and goals.
5. Failure to consider all the adverse consequences which might result from a selected alternative.

Example of Management Systems Approach

To illustrate the problem solving process, two actual wastewater supervisory problems are presented on the next few pages. Please review the application of the management systems approach to this specific problem. An outline of the approach is included with the problem to assist you. Here are the basic steps in this problem solving process:

I. Define the problem and the objectives
II. Summarize the management assumptions
III. Apply the solution development approach
IV. Evaluate the alternative solutions
V. Implement the recommendations

Now, read on to see how each of these steps is used in the following examples.

MANAGEMENT SYSTEMS APPROACH

Example 1: *A Union Problem*

I. A. Define Problem and Objectives

Each of the utility's 25 employees, except top level management, is required to punch a time clock to record their starting and quitting time each day. At the last contract negotiations, the engineers' bargaining unit requested elimination of time clock punching for all engineers. Their reasons presented were:

1. Time clock punching is unprofessional, and engineers are professional.
2. It is demoralizing to engineers to be treated as non-professionals.
3. Professionals should be on the merit system for reporting their time.
4. All City departments are not using time clocks.
5. Time clocks are an antiquated method of keeping records.

The department assigned a staff member to prepare a study to ascertain the factors involved for considering such a request.

B. Objectives of Study

1. Determine if it was a fact that punching the time clock was objectionable.
2. Determine what the objections are.
3. Determine percentage of employees objecting in professional levels, in non-professional levels.
4. Determine factors involved if time clocks were eliminated.
5. Determine an alternative method to record time.
6. Determine impact on record keeping by payroll division, by accounting division.
7. Evaluate cost in changing and maintaining change.
8. Evaluate impact on employees and expected problems if change is or is not made.

II. Summarize Management Assumptions

A. Define Possible Alternatives

1. Eliminate time clock punching for all professional classifications, and retain for non-professionals.
2. Eliminate time clock punching for all employees.
3. Use sign-in sheets on merit system.
4. Use supervisor check-off sheets.
5. Keep time clocks for all employees.

B. Criteria for Evaluation of Alternatives

1. Efficiency of recording time.
2. Impact on payroll and accounting procedures.
3. Cost of initiating, operating, and maintaining alternate system.
4. Impact on employees' morale.
5. Problems that will arise by intentional or unintentional errors or omissions.
6. Accuracy of systems.

III. Solution Development Approach

Basic Analysis Technique

A. Determine objections to time clock.

1. Surveys, questionnaires and interviews with the engineers were ruled out as being inconclusive because their union representatives had already talked to all of them about elimination of the time clocks as being desired. It was determined that if a change were going to be made, it would be department-wide, and not sectional, to provide standard procedures for all employees. In this light it was decided to sample the reaction of other employees regarding the time clock. Supervisors were asked to obtain reactions from the employees on an informal basis. The results indicated that the majority of the employees had no objections to time clocks. The objections voiced fell into the following categories:

   a) Too inconvenient and irritating.
   b) Another means for regimenting the employees.

2. It was noted, however, that most of the objectors were the ones that had a tendency to be habitually late.

B. Investigate alternative methods of keeping time.

1. Sample forms were made up for daily signing in and out by the employees, and also for supervisor record reporting of personnel.

2. Timekeepers at the various locations, as well as the payroll division and the accounting division were asked to review the forms and to determine the necessary changes in procedures required to implement such means of record keeping. Many objections surfaced including the following:

   a) Time cards were smaller, covered the two-week pay period, and were self-sustaining in that no "people" attention was required.

   b) Time sheets would be bulky, subject to "people" errors and conducive to cheating.

   c) The timekeepers stated that additional help would be required.

   d) Payroll and accounting stated that time sheets would seriously increase their work load in that it would require them to handle 14 daily time sheets in lieu of one time card for each employee.

   e) Recall of information would be more difficult with time sheets.

IV. Evaluation of Alternatives

A. Eliminate Time Clocks for Professionals

1) Necessitate dual system of record keeping.

2) Increase payroll and accounting costs.

3) Increase probability of errors.

4) Leans toward favoritism and caste system instead of equal treatment for all employees. Subject to decrease in morale of all employees.

B. Eliminate Time Clocks for All Employees

1) Increase cost of record keeping.

2) Require larger storage areas.

3) Require additional manpower.

4) Recall of statistics more difficult.

5) Human errors will increase costs.

6) Makes system susceptible to cheating and tampering.

7) Burden supervisors with additional work.

8) Makes validation of records more difficult if needed for grievance procedures.

C. Keep Time Clocks for All Employees

1) System proven most economical.

2) No stigma attached to punching time cards.

3) Provides equal treatment for all employees.

4) Accuracy of record system is maintained.

V. Recommendation

Keep existing time clock system. Communicate to employees the merits and advantages of system, and explain complications and costs involved if system were changed. Concentrate on trying to improve morale of those objecting to time clock by showing them the fairness of the system as it applies to all employees.

Example 2: *A Material Control Problem*
(At River City)

I. Define Problems and Objectives

A. Problem

Inventory levels of equipment, parts and supplies will increase as new electronics and pump stations are implemented. Storage space for the inventory will be inadequate. Records also indicate that there is a lack of control of material with excessive damage, loss, pilferage, etc.

B. Objective

The objective will be to reduce material costs while providing at least as good a plant service level through an improved material control system.

II. Summarize Management Assumptions

A. Define the Possible Alternatives

1. Build new facilities to store expected increases in material levels.
2. Cut inventory levels of all items to eliminate the need for additional space.
3. Improve security program to reduce loss and pilferage.
4. Develop an improved inventory control system.
5. Determine the current level of inventories in terms of expected need and classify items by usage per year, cost and critical need to operation of plant.
6. Cut inventory levels of selected items to reduce or eliminate the need for additional space.

B. Criteria for Evaluation of Alternatives

1. Consider impact on service level of the plant provided by spare parts, supplies, etc.
2. Consider impact on cost level of the plant for inventory investment and storage space.

III. Solution Development Approach

Selection of the Appropriate Technique

A. Take immediate management action - require a cut in inventory levels.

B. Take immediate management action - assume levels of inventory are reasonable and request new space for storage.

C. Take immediate management action - recommend that a new inventory control procedure be implemented.

D. Perform a management audit of the material control system and inventory levels prior to making any final decision on space or major inventory cuts

IV. Evaluation of alternatives

A. The first two alternatives solve the inventory/storage space problem temporarily, but, each could cause serious additional consequences without management analysis. If inventory is cut without analysis, it is quite possible that critical items might be reduced to an inventory level that could cause interruptions in plant service. If it is assumed that current inventory levels and the control system are adequate, service will continue at current levels, but costs will increase as inventory increases and new storage space is added.

B. The recommendation for a new inventory control system, if implemented, will help solve the problem in the long run but probably not in time to help in the current decision of new storage space.

C. The best approach is to perform a brief management audit (review) of the current material control system. The review should include, but not be limited to:

- Determine the current inventory level for all items by class or group, with special emphasis on critical, long lead time, and high cost items.
- Define usage by year (and/or months) for each item group.
- Estimate costs from loss, pilferage and damage. Also review assumption of inventory investment cost, insurance, etc.
- Interview employees directly involved in materiel control for suggestions and problems.
- Obtain from records (or estimate) frequency that service interruptions or below normal quality effluent resulted from each of material (parts, supplies, etc.).
- Review the strengths and weaknesses of the control system itself such as; forms required, usage of computers, training of people in material control, ease of updating records as material is received and used, etc.

After the audit has been completed (several weeks) you will have sufficient information to determine where inventory can be reduced, and whether the new space is required. In addition, the audit will provide the necessary information to determine if and what improvements are needed in the material control system.

REVIEW

This section on decision-making and problem-solving has concentrated on one problem-solving method. You might consider this approach too lengthy or time-consuming, believing that you run through most of these steps in your head in a fraction of the time required to detail the aspects on paper. But beware. In whizzing along, you might discover that you are ignoring several alternatives which are not immediately obvious. You will be asked to use this problem-solving method in some of the subjective portions, to give you an opportunity to seek out the underlying aspects of the problem, to locate some alternatives which are not obvious and to give you the opportunity to put this approach into practice.

You might want to ask yourself the following questions in the analysis of the problem:

	YES (then take action)	NO (might indicate a different action or no more concern on your part)
1. Does a problem really exist?		
2. Is it your problem (or someone else's?)		
3. Do you understand the actual (often underlying) problem?		
4. What kind of problem is it?		
5. Does it require attention now?		
6. Can needed facts, information, or human resources be obtained?		
7. Are you able to check out alternative solutions?		
8. Are you able to accept the consequences of the decision?		

	YES (then take action)	NO (might indicate different action or no more concern on your part)
9. Will you be able to check on the correctness of the decision?		
10. Will you be able to implement alternate decisions if the initial choice doesn't work out?		

Does this homework help you in looking at a problem?

Ready to look over the Mini Review and advance to Section 2 of Lesson Three on Communication? Continue .....

FUTURE REFERENCE

Helferich, Omar Keith, "Management Systems: Total Utility Perspective," Journal, American Water Works Association, Vol. 63, No. 11, November 1973, pp. 670-676.

"There is no easy way to recognize, define, and solve management problems. It requires a 'let's do it' attitude. The author believes that a management-audit procedure will be of assistance to the individual water utility management team once the 'let's do it' attitude is adopted."

Kazmier, Leonard J., Principles of Management, McGraw Hill Book Company, New York, 1974, p. 98.

"Decision-making skill is the key to successful planning at all levels. This involves more than the selection of a plan of action, for at least three phases--diagnosis, discovery of alternatives, and analysis--have to be completed before a choice can be made."

Lazarro, Victor, editor, Systems and Procedures: A Handbook for Business and Industry, Prentice-Hall, Inc., Englewood Cliffs, New Jersey, 1968, pp. 499-505.

"Experience indicates that there is no short cut to a complete and comprehensive systems study, whether it is a general systems project, an EDP project, or an integrated data processing assignment. The bypassing of a specific item should be done with the understanding that it does not apply to the areas being analyzed."

MINI REVIEW: SECTION 1

(Answers at bottom of page)

_____ 1. Which of the following is NOT one of the steps in the decision making process?

a. analyzing the problem
b. define the problem
c. follow up the result
d. note one solution to the problem and implement it

_____ 2. Getting the facts is the first step in what part of the process?

a. problem definition
b. problem analysis
c. development of alternatives
d. selection of alternatives

_____ 3. The factor aiding the supervisor in the selection of alternatives which is based on previous, although unremembered experience, is often termed

a. experience
b. advice from others
c. experimentation
d. intuition

_____ 4. Experimentation is probably the most common method used in managerial problem solving.

a. True
b. False

_____ 5. Scientific decision-making tends to refer to

a. problem solving in a particular order
b. using computer techniques on quantifiable information
c. experimentation
d. consulting a scientist

* * * * *

Ready for the second section of Lesson Three? Here it is.......

ANSWERS: 1) d 2) b 3) d 4) b 5) b

LESSON THREE - SECTION 2

THE COMMUNICATING MANAGER*

Wilbur looked up as his secretary, Mildred, placed the morning mail on his desk. She looked at Wilbur hesitantly, then asked, "Mr. Wainwright, are we going to close the utility's accounting department?"

"Where on earth did you hear that, Mildred?"

"It was in the morning paper. Jeanette brought in the clipping and was showing it around."

"You know you can't believe everything you read in the newspaper," Wilbur answered. "Sometimes I don't know where those business reporters go for their information."

Mildred persisted. "Actually, I heard it several days ago. At first, the rumor was that there would be a small layoff, due to centralizing the city accounting functions. Then, the next day, the girls were talking about closing the department. When I saw today's clipping, I felt I should let you know."

"I appreciate your concern, Mildred, but I can assure you that we are going to keep that Accounting Department functioning just as hard as John Day, the head of that department, can work," Wilbur replied confidently, as Mildred breathed a sigh of relief and hustled back to her desk, probably to call Jeanette.

Something jarred Wilbur's memory as he said those words "I appreciate your concern," and he realized with a start that a similar situation had happened to him way back, before his job at Deephaven. It had happened just the same way--he'd been the Director of Administration then, of a system in Grand Junction, and his secretary Edith had brought him a clipping from the morning's paper. Unfortunately, unlike today, the information in the paper had been basically true. He remembered that he'd even asked her if it mattered if it were true. What had he said now...

---

*Adapted from Training, Study Number 7, August 1972, p. 26.

"I appreciate that, Edith, but why are you so concerned? Suppose the rumor were true?"

"As executive secretary to the director of administration, I guess I'm not in danger of losing my job, but the girls in the billing department are all shook up over it. Many of them need their jobs and would find relocation very difficult."

"Tell the girls not to be concerned," Wilbur had replied after a moment of thought. "The billing section is not going to be affected."

"There's not going to be a layoff then?"

Wilbur had hesitated. "I didn't say that, exactly. Look, Edith, I can't say any more at this mement. We're having a meeting with Mr. Kirby. Maybe I'll be able to tell you more afterward."

Later, at the staff meeting, Wilbur had been less reluctant to speak out. "Kirby, we've got to tell them now. The rumors are getting out of hand."

Malone, the treatment plant superintendent, had nodded. "I agree with Wainwright. Morale is coming apart in the plant. Some of the operators feel they'll lose no matter which rumor is true. They can see the trend to instrumentation and to automation and they figure that it's only a question of time for some of them. They also fear the possibility of the plant's closure due to the proposal of a regional treatment facility."

"It's even worse among the middle management and first-line supervisors," Wilbur had said.

Gerald Kirby, the general superintendent, had waited for the rash of comments from the other managers to end before he responded. "Gentlemen, perhaps you have forgotten the bleak situation we have been facing. Let me review the facts. First, inflation is causing price escalations for our new treatment plant. Second, Datalox Corporation has agreed to furnish a new computer with no price increase if we order now. This would not only cut our costs, but increase our efficiency."

"But our people lose their jobs," Wilbur had said.

"That is most unfortunate," Kirby had replied. "Some may be transferred to other city offices."

"Can't they absorb all of our people?"

Kirby had shrugged. "Perhaps, certainly most of them."

"So," Wilbur had said, "our next step is to tell the employees there will be extensive layoffs."

"Not quite," Kirby had said. "Your suggestion is noble but impractical, Wainwright. The Datalox delivery is five and a half months away. We can't afford five months of low productivity."

"What are you suggesting?"

Kirby's tone had been deliberate. "I suggest an official news release for tomorrow's paper to contradict the one which got to them yesterday. Read the news release you wrote, Pearson."

Pearson read the carefully prepared article: "Contrary to rumors which have been circulating about purchases of a new computer for the sanitary district and projected personnel layoffs, the district today stated that existing equipment was to be completely refurbished and re-equipped. The changes are expected to improve efficiency within a year. A starting date for the refurbishing will be announced shortly."

"But that's a lie," Wilbur had said, "an outright lie."

"I prefer to call it a cover," Kirby had replied. "It's an economically necessary cover story."

Malone had also been stunned by the cover story approach. "What happens when it becomes apparent that we are doing no refurbishing?"

"It will be three or four months," Kirby had said, "before anyone really begins to question it, three or four months of valuable, productive time. Then we will announce that, after extensive re-examination, we have decided to proceed with conversion to computerized record keeping and billing."

"It stinks," Wilbur had said, realizing the decision had already been made. "It's cruel and deceptive."

"Really?" Kirby had asked. "And would releasing the 'truth' be less cruel to the economic future of the district? I think not, Mr. Wainwright. Sleep on it, and I think you will agree."

Wilbur shook himself out of his reverie. Bad memories, those were. It hadn't worked either, the truth had come out, the employees had quit--disgruntled with the system and all of the managers, and he had quit too. Fortunately, he'd found that position at Deephaven, where he had maintained quite a different policy regarding employee communication. Kirby may have had a valid point, but Wilbur did business a different way.

* * * * *

Dealing with rumors is difficult, no question about it. There will continue to be personnel problems as the water and wastewater industry approaches computerization, automation, regionalization, increased treatment complexity, and political entanglements. The utility managers at all times must be able to communicate effectively and manage with authority.

THE COMMUNICATING MANAGER

One of the first skills which a child learns is speech. Isn't it amazing, then, that people throughout their lives still seem to have trouble communicating? But they do. One of the most common problems listed in the first lesson was that of COMMUNICATION. The younger employees can't communicate with the older employees--the older employees can't get the younger ones to listen. (The generation gap may not affect everyone equally, but eventually that gap appears.) Or, the upper echelon may issue orders down the line, but it may forget to provide a channel to get some feedback from those orders. Everyone seems to have one communication problem or another. This lesson is designed to start you toward some solutions.

Communication takes place both internally and externally in organizations. Effectively communicating with people internal and external to the organization, and understanding what motivates their behavior is essential to achieving success in the directing function.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

How to Communicate Effectively?

- What is meant by effective communication? Review your efforts to explain a problem or issue direction.

- The difference between one-way and two-way communication? Isn't it important for you to know whether an instruction was received and carried out?

The Elements Involved in Communication?

- What is meant by upward, downward, and horizontal communication within the formal communication network?

- What is meant by 'grapevine' communication?

The Relationship Between the Supervisor and the Channels of Communication?

- How the supervisor is able to promote communication?

- The major means used for communication?

What Constitutes Barriers to Communication?

- The major barriers to communication?
- Why language can be a barrier, even when both communicators speak the same one?
- The communication barriers which may be created by status and position?
- What communication barriers are created by resistance to change?
- How the mental attitude of the employee can be a barrier to communication?

How to Overcome Communication Barriers?

- How feedback is vital to overcoming communication barriers?
- The benefits of using simple, direct language?
- The importance of effective listening?
- What communication is non-verbal as well as verbal?
- The value of repetition?

The Supervisor's Responsibility Toward Upward Communication?

- That the supervisor's communication responsibility is more than between himself and those he supervises?

Relationship Between the Grapevine and the Supervisor?

- The advantages and disadvantages of the grapevine for the manager?
- The reasons for the start of rumors?
- The available ways to deal with rumors?

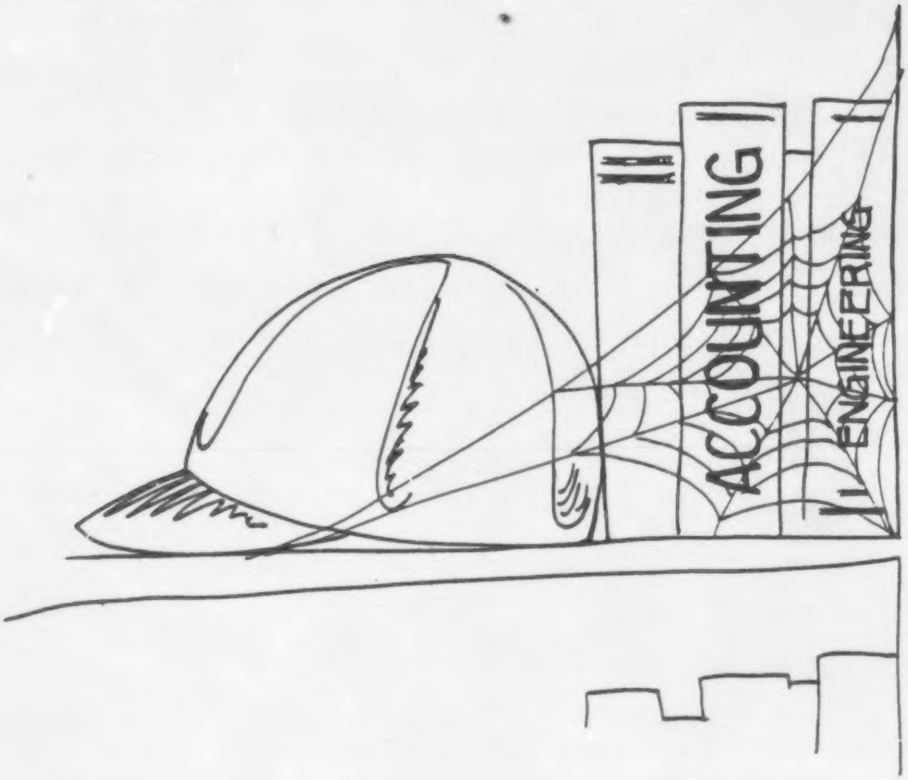
THE COMMUNICATING MANAGER

Assigned Text Reading:
Chapter 6, Communication in Supervision

This lesson on communication is one of the most important lessons in this entire course. You must be able to communicate effectively if you are to become a successful manager.

"But," you say, "I communicate. The problem lies with others--they don't listen." You are at least half correct there. Communication is not sending out, but at least a two person interchange. "Interchange" does not require an answer, but does demand understanding

Listening and comprehending what is being communicated is vital. Work through the following exercise to check your comprehension and ability to follow instructions.



Though still important, technical skills take a back seat to people managing skills.

Communication Exercise

Work through the following questions as rapidly as possible. However, do not sacrifice accuracy for speed. This exercise is for your benefit.

NAME______________________________

DATE______________________________

1. Print your name, last name first, on the top line following the word "name."
2. Read carefully all of the following directions before doing anything.
3. Circle the word "name" in sentence one.
4. Draw five small squares in the upper left-hand corner of this page.
5. Put an "X" in each square.
6. Put a circle around each square.
7. Sign your name under the title.
8. After the title write "Yes, Yes, Yes."
9. Put a circle around each word in sentence number 7.
10. Put an "X" in the lower left-hand corner of this page.
11. Draw a triangle around the "X" you just put down.
12. On the bottom of this page multiply 703 by 9805.
13. Draw a rectangle around the word "page" in sentence number 4.
14. Underline your first name when you get to this point in the test.
15. If you think you have followed directions up to this point circle "I have."
16. On the bottom of this page add 8950 and 9850.
17. Put a circle around your answer. Put a square around the circle.
18. Subtract the answer from question 12 from the answer from question 16. Draw a triangle around it.
19. Now that you have read all of the directions as stated in direction number 2, follow direction number 1 only. Do not follow any of the other directions; omit them entirely.
20. Please do not give this test away to any other students who might be taking the course. Hopefully, you followed all the directions and hence, according to the instructions in question 19, you did nothing more than write your name.

How did you do? Do not feel bad if you worked through the questions as you went along--most of us approach our work with an attitude of diving right in and getting it done piece by piece. But, sometimes, it pays to get the entire picture first. Read on through the Key Points for this section.

KEY POINTS

Effective Communication

Notice that effective communication involves both information *and* mutual understanding. This does not mean mutual agreement, necessarily, but it certainly is the first step toward mutual agreement.

To achieve mutual agreement, you have to LISTEN. This is not easy. You do not just sit there and let the employee talk on. You have to *actively* listen. What can you do to *listen* more effectively? Try these pointers:

1. *Concentrate on what is being said or communicated*. Show that you are interested in what is being said. Repeat or reaffirm what is being said to you as a check that you do understand what the employee is trying to tell you. If emotions are distorting or coloring the story as it is being related, try to objectively rephrase the issues so that the facts, and only the facts, are being discussed. Concentration is also a nonverbal exercise. Are you fiddling with your papers while saying, "yes, yes, go on, I'm listening"? Look at the person, listen to the person, give the person your full attention.
2. *Become familiar with your impression of the person bringing the message*. What do you *really* think of that person? Your perception of that employee will color the message that employee is bringing to you.
3. *Respond thoughtfully, showing that you understand the entire message--both the facts and the feelings of the employee*. Aim at getting down to the real message.

Communication Channels

Communication requires at least one sender and one receiver. You hear people talking about the channels of communication. This encompasses the entire range of means and methods used to transmit messages. It also includes the entire number of people that a message may go through from the original sender to the ultimate receiver.

Formal Versus Informal Channels

There are both formal and informal channels for communication. When the utility superintendent sends the supervisor or middle manager (that's you) a memo, and you pass this information along to the shift operators you supervise—this is an example of the formal communication channel. The formal channel is usually organized the way the system is organized, like an organization chart.

The informal channels, on the other hand, are organized by groups of people who talk or communicate to each other. Sometimes this follows the formal channels, but usually this is arranged in terms of friendships, coffee breaks, social or recreational programs or car pools, or by a variety of other means.

Obstacles to Communication

It is important to realize what general situations constitute barriers to communication. But do not stop with this list. Many of the cultural and background 'environmental' conditions of individuals are built-in communication barriers that will always pose a challenge to communication. And, regardless of how careful the supervisor is to overcome communication obstacles--feedback is ESSENTIAL to determine that those obstacles WERE overcome. The memo you passed along from your superior might have required a response from the shift operators, so how do you receive this reply? It could be verbal or written, but you, in turn, will no doubt have to respond to your superior, closing the loop.

Language

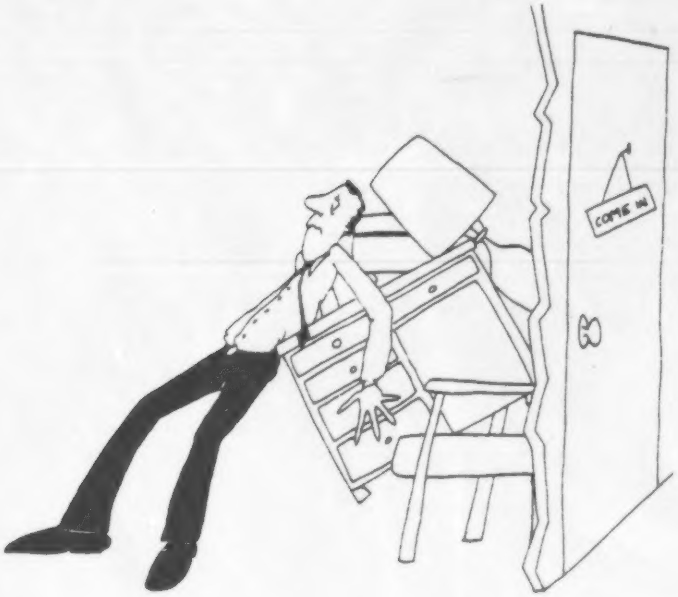
People with two different languages often have difficulty understanding each other--this is an obvious situation. But people who supposedly speak the same language may also have the same problem without realizing it. This problem has been pointed out between different age levels, or between different subcultures, but communication obstacles often exist between two people with different educational backgrounds--and feelings of inferiority or status often prevent an individual from asking for clarification. One responsibility of the supervisor is to establish an atmosphere of rapport so that individuals will feel free to ask questions. In the utility business, at least, the language is understandable, but the questions deserve answers, if only to be certain that a misunderstanding does not result in damage to equipment or harm to individuals.

Status Position

Do you say, "hey, come see me any time you have a question," and then growl at the individual who shows up in your doorway? If so, you are probably trying to break down that barrier of position, but you need to learn to do it better. Do not let your employees think that they have to give you "yes" answers just to please you, when they really mean "no" or even "I don't know."

Resistance to Change and Other Barriers

Remember that, as a manager, you have to be aware of the technical, professional, and social changes taking place. You also have to realize that some of these changes are not going to be favorably received--you probably do not like some of the changes yourself. Other changes, those which you have prompted, may be very clear and desirable to you--but your employees may not know the reasons for those changes and may not like them Human nature tends to screen out undesirable messages. Your responsibility as manager is to penetrate that screen and get those messages through. Attitude plays an important part in what people hear or receive--*and that message may be very different from the message that was sent.*



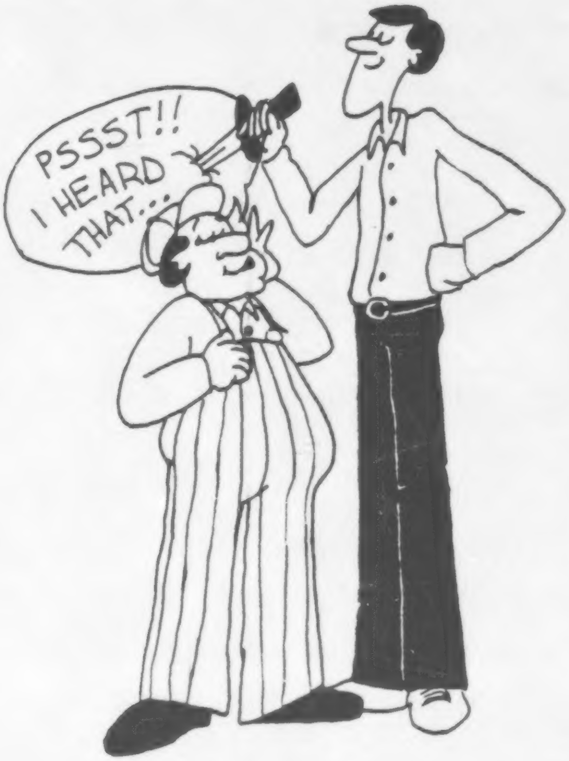
A manager should be sincere when welcoming workers with questions and problems.

Overcoming Barriers to Communication

This is an important portion in the text, and you would do well to review it. Remember, feedback is probably the single most important element in breaking down barriers because you are able to learn what did and did not get through. The other techniques, using simple language, being an effective listener yourself, using actions as well as words (and coordinating them) and repetition are extremely important--but you still need feedback to keep YOU informed.

Grappling with the Grapevine

When a particular message is transmitted, or sent along this informal channel, its transmission is termed "the grapevine." The dislike of this informal communication channel by managers is usually due to rumors. However, this informal communication means is not only entirely natural but necessary to the happiness and need fulfillment of the employees. (Remember that hierarchy of needs in Lesson Two?) Supervisors must learn the proper ways of dealing with the grapevine and rumors which can be spread through it.


PSSST!!
I HEARD
THAT...

One effective way of stopping a rumor is to kill it in its path.

Notice the suggestions given in the text for coping with grapevine rumors. The first point is that the "supervisor should be tuned into the grapevine to know what is said." The second point is that rumors are best countered with facts. Often, if the supervisor's basic communication with his subordinates is excellent, rumors will have little cause or reason to grow—and if the supervisor's leadership is generally accepted by the employees, rumors can be stopped.

Feedback

Feedback that can help another person improve has the following characteristics:

1. It is descriptive rather than evaluative.
2. It is specific rather than general.
3. It takes into account the needs of both the receiver and giver of feedback.
4. It is directed toward behavior that the receiver can control.
5. It is solicited, rather than imposed.
6. It is well timed.
7. It is checked to insure clear communication.

Feedback is encouraged via questions. Look at the types of questions available to the communicating manager:

1. Factual—gets information and often opens discussion.
   "What happened between Joe and Sam on the night shift yesterday?"
2. Explanatory—gets at reasons, and often broadens discussion.
   "Why did the argument start? How long has this been going on?"
3. Justifying—challenges old ideas and encourages proof.
   "How do you know Joe started it? Were you there?"
4. Leading—introduces new ideas and helps advance suggestions.
   "Do you think they've argued over other work before?"
5. Hypothetical—helps to suggest alternative opinions, changes course of discussion.
   "What would transferring one of them do to the morale of the rest of the crew?"

6. Alternative--helps lay out the decisions to be made, shows where agreement is necessary.
"Should I deal with Joe and Sam separately or together in hopes of working out a solution?"

7. Coordinating--helps in obtaining agreement, paves the way for action.
"Then can we conclude that I should talk to Sam and Joe together?"

Obtaining Feedback Via Audits

Sometimes it is easier to talk about obtaining feedback than it is to get it. Feedback comes from others, but it does not stop with just what others TELL you. Observation on YOUR part plays a major role in obtaining feedback. To help you improve your observation, we are providing you with some questions. These questions are in the form of an AUDIT (you thought audits were only in the realm of accountants, didn't you?).

First, we have included a communication audit--to help you zero in on some of your communication skill abilities. Then, we have provided the first portion of a supervisory management audit. This audit will continue throughout the remaining lessons. You will be asked to complete this supervisory audit as part of the subjective portion of each lesson. (When you arrive at Lesson Seven, you will have an opportunity to run through the questions a second time--hopefully, you'll find some major areas of improvement in your managerial skills by that time).

Now, go on to the next page and begin the communication audit...

First, The Communication Audit

To check your communication situation, go over the following 'communication audit.' This is NOT a test, just a checklist for your benefit.

I. Here is a communication audit. Just check 'yes' or 'no' for the first thirteen questions, then provide simple answers for the last three questions.

	Communication Audit*	YES	NO
1.	Do you believe that you are a part of management?		
2.	Do you believe that you have a part in management?		
3.	Do you believe that you are adequately informed on management aims and long range plans?		
4.	Do you think that present information channels are adequate?		
5.	Is there enough management participation in departmental meetings?		
6.	Are you involved in utility planning?		
7.	Is your authority commensurate with your responsibility?		
8.	Do you feel free to seek counsel on special problems related to, but not part of your job?		
9.	Do you have rapport with both the people you supervise and the people who supervise you?		
10.	Are promotions given generally to proper and deserving individuals?		
11.	Do you receive proper tools, information, and incentives to function as part of management?		
12.	Is cooperation and contact with other departments satisfactory?		
13.	Does management inform you adequately about the industry, the utility, financial standing, and proposed changes?		

---

*As utilized in the Institute for Water and Wastewater Utility Management at Michigan State University, by Dr. Hal Hepler, Professor of Business Communication, MSU.

Communication Audit (continued)

14. What information would you like to receive?

____

____

____

15. What suggestions do you have to improve present meetings?

____

____

____

16. How could your work be made more effective?

____

____

____

Check yourself when completed: the more 'yes' answers marked, the better. See if you can actually implement some of the suggestions you have made for numbers 14, 15, and 16.

Number of "Yes" Responses	Rating
0 - 4	You've got trouble
5 - 10	Average
11 - 13	Superior

Now. What are some ways you can improve your communication (even if your score was superior on the audit, one can always look around for ways to improve communication)? We all realize this is just scratching the surface in terms of communication improvement, but here is a good place to start. A number of these suggestions will help employee morale as well as aid in general communication.

Communication Suggestions

1. Make communication from employees part of the job (yours and theirs). Encourage news (facts, not gossip). Encourage both good and bad news (watch your nonverbal language here--a few scowls and your employees will revert to telling you only the good news again). Always have this communication on a two-way basis (them telling you is as bad as you telling them).

2. When you must 'tell' your employees something, remember the following suggestions: telling often includes other styles of delivery such as selling, consulting, or even joining. Your 'consulted' idea might prompt more teamwork than just your 'telling' style.

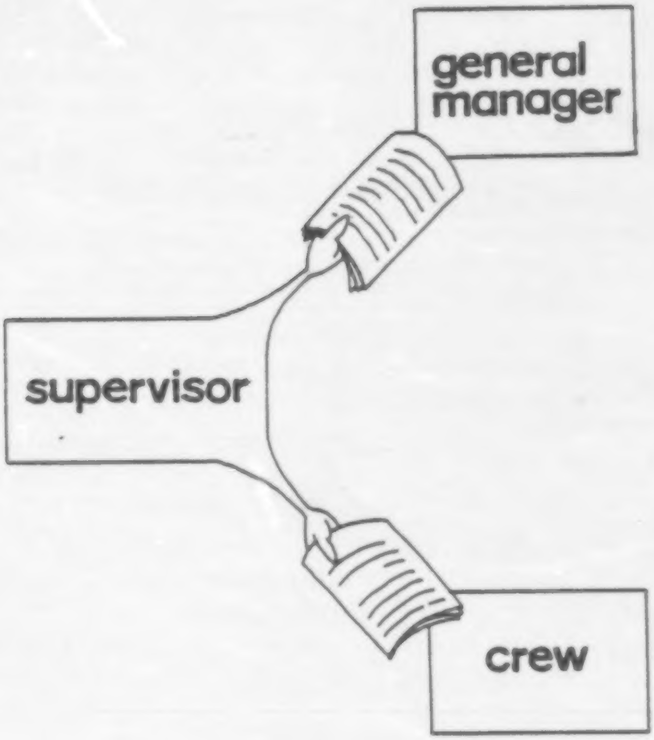
3. Offer feedback--but remember that this includes a host of compliments as well as criticism.

4. Share office and company news: this will often counteract rumors and gossip. As well, catch those rumors when they are small and slightly inaccurate, not massive and totally erroneous (but yet believed).

5. Try to be as specific as possible in your communication. This is especially true when concerned with employees appraisals. Again, keep those two-way communication channels open.

A Reminder

You, the manager, must manage communication as well as people. You must be sure to communicate clearly with your subordinates, but do not let the message stop or change between you and your supervisor. Part of your total responsibility is to keep upper management informed--communication is two-way, in both directions.


general manager
supervisor
crew

The supervisor must report in writing to his (or her) manager and crew.

Second, The Supervisory Management Audit

Do you now understand how audits operate (in a non-financial sense)? Read over the introduction to the supervisory management audit. You will find your first set of questions for this audit in the subjective portion of the test section. Look over the introduction carefully--if used thoughtfully, this audit should provide you with some valuable feedback on your managerial expertise.

Continue by reading the introduction to the Supervisory Management Audit on the following pages....

SUPERVISORY MANAGEMENT AUDIT

FOR

WATER/WASTEWATER TREATMENT FIELD

PREPARED BY:

DR. OMAR KEITH HELFERICH

CONTENT CONSULTANT

What is this audit, you ask? This audit is a series of questions on the job. Through answering these questions, you will begin to glimpse your present management skills and will be able to identify areas where you could improve.

Revised Version
September, 1977

SUPERVISORY MANAGEMENT AUDIT

INTRODUCTION

Before management problems can be alleviated, they must be identified. "What are our system needs?" This is the question each utility-management team should be asking, according to a statement in the May 1971 special issue of Willing Water. The special issue further states that recognition and acceptance of these needs is a prime prerequisite of programs that will provide further improvements in service and quality. As part of the Action Now program, AWWA developed a self-evaluation questionnaire to assist in appraising the technical needs of a utility. Michigan State University through the AWWA-WPCF-sponsored Institute for Water and Wastewater Utility Management, developed a self-evaluation audit format that will assist a utility in appraising management-related problems. Use of a practical management-audit format should provide benefits to water and wastewater utility.

Can Audit Procedures Define Management Problems?

There are several examples of the practical application of the audit approach to management. Everyone is generally familiar with the accounting audit, which checks actual cost records against the accepted standard procedures. Auditing was for many years associated with and considered a part of accounting only. The essential purpose of the audit was to provide an examination by a firm of outside auditors to determine the financial condition and to uncover errors and fraud. Today modern management in business, with its greater complexities, requires a close check on the entire scope of management control and performance. The objective is to achieve the most effective and efficient administration of the total business operation with continuous improvement in policies and procedures. The management audit can be defined as:

> A comprehensive and constructive examination of an organizational structure of a company or its components such as division or department, its plans and policies, its financial control, its methods of operation, and its use of human and physical facilities.

The objective of the management audit is to reveal defects or irregularities in any of the elements of the organization under study. The purpose of a management audit is to achieve

- Reduction of waste and deficiencies
- Improved methods
- Better means of control
- More efficient operations
- Greater use of human and physical facilities

CONCLUSIONS

The water and wastewater utility industry has recognized the management needs of the industry for many years. However, for various reasons individual utilities have not defined their own particular management deficiencies. Several factors suggest that this situation will be corrected. First and foremost is the increased interest and effort from within the industry in being professionals in management skills and in the performance of their utility operations. The major associations also have clearly demonstrated increasing interest and effort in management development for the industry. Second, there are pressures that will force increasing interest in the recognition and solution of management deficiencies in the industry. These include but are not limited to: (1) the transition from construction to operations as more new plants come on line; (2) greater pressure by governmental agencies for some form of certification at all levels, possibly including supervision and management; and (3) greater involvement in the review of utility performance by public-interest groups. There is no easy way to recognize, define, and solve management problems, but a management-audit procedure will be of assistance to a utility management team.

REVIEW

This section on communication should have communicated the following points:

1) that effective communication requires information and mutual understanding;

2) that communication may be accomplished in a multitude of ways. The important part is what is communicated, and that the same message is sent and received;

3) that there are numerous barriers to communication, but these barriers can be overcome, if the manger is aware of them;

4) that feedback is essential to the communicator.

NOW, HOW IS YOUR COMMUNICATION?

FUTURE REFERENCE

Caskey, Clark C., "The Functions of Management," Journal, American Water Works Association, Vol. 64, No. 6, June 1972, p. 366.

> "Successful managers are generally good communicators because they believe in the importance of keeping subordinates informed. They know the critical aspects of telling employees what is expected of them, and how well, or poorly, they are doing. They know that sound communications is a strong force of motivation and a most important factor in sound direction of others."

Corey, John B. W., "Motivating Employees," Journal, American Water Works Association, Vol. 65, No. 1, January 1973, p. 39.

> "The ability of a manager to implement policies that motivate employees has little value if he cannot communicate. Full communication also requires that he be aware of the views and attitudes of the employees."

Davis, Keith, Human Behavior at Work, fourth edition, McGraw-Hill Book Company, New York, 1972, p. 380.

> "The only way that management can be achieved in an organization is through the process of communication...Communication has its limitations. It is merely the process by which a manager takes action, rather than being the substance of good management. The best communication will not compensate for poor plans."

Dowd, Thomas F. Jr., "Employee Attitude Surveys: A Key Management Tool," Journal, American Water Works Association, Vol. 65, No. 1, January 1973, p. 46.

> "The sophisticated manager is convinced that effective two-way communication between management and employees is an essential ingredient in any efficient business operation. However, such a man is likely to be too busy to communicate at all or so busy communicating downward that he is unable to hear anything coming the other way."

McLeod, Robert J. "Communication--Key to Effective Labor Relations," Journal, American Water Works Association, Vol 68, No. 9, September, 1976. pp. 453-455

> This article builds on the needs and motivation of the human being and illustrates the use of communication in establishing those motivating aspects. In McLeod's words, "communications must be continuing and two-way."

FUTURE REFERENCE (continued)

Tolle, William A., "Management-Information Systems," *Journal*, American Water Works Association, Vol 63, No. 11, November 1971, p. 688.

"Stated briefly, the primary reasons for using computers in today's management world are as follows: 1) to reduce personnel costs; 2) to provide additional or more meaningful information; and 3) to gain use of improved communication techniques."

MINI REVIEW: SECTION 2

When you feel comfortable with the information in Chapter 6 take this review quiz

(The answers are located at the bottom of the page--this quiz is for your benefit--do not send it in.)

_____ 1. Effective communication requires

a. two or more people
b. mutual agreement
c. mutual understanding and information
d. force

_____ 2. The formal communication network refers to

a. only written messages
b. the way the company is organized
c. only upward communication
d. downward communication

_____ 3. Horizontal communication is

a. rumors spreading throughout the department
b. people talking in general in the same department
c. people at the same level in different departments communicating
d. supervisors talking to employees

_____ 4. Adequate preparation refers to

a. writing out all messages before delivering them orally
b. reading up on every subject before talking about it
c. clearly organizing your ideas before communicating them
d. repeating your ideas over and over

_____ 5. Visual messages are

a. outdated today
b. required to be in color due to the influence of color TV
c. useless
d. often underestimated in effectiveness

* * * * *

ANSWERS: 1) c 2) b 3) c 4) c 5) d

TEST THREE INTRODUCTION

In Lesson Three you are introduced to two important concepts: The Management Systems Approach and the Supervisory Management Audit. We think you will find that the Management Systems Approach will broaden your ability to solve problems. While this approach may seem lengthy at first, it has helped many managers like yourself in their decision making capacity--expecially in learning to examine all the alternatives. Comments from some of those managers can be found below. The audit, which begins in this lesson, asks questions about the topics to be covered in the next lesson. At the end of Lesson Seven, you will be asked to complete a 'summary audit' to see if any improvements have been made in your management techniques.

> *"Looking back now, if we had developed a universal attitude such as the Management Systems Approach to problem solving, I believe we would have done much better. Defensively, private enterprise often calls for spontaneous decision making. From that basis, I hope a great many future managers and supervisors will come under the influence of your teaching.*
>
> *...I realize my available time to work on the course has been limited, but believe me, the course works on me every day. With heavy summer transitions underway, I find real relief through utilization of the 'write-it-down' organizing system you teach."* EHH

he subjective portion was very long and te difficult--but critical decisions shouldn't come easy, I guess." WAH

"The most interesting part of the lesson was the outline for problem solving. I have been able to use this in my day-to-day operations." RHS

"The decision making lesson was the most interesting. It shows that a lot of thought and time goes into decisions and that more than one alternative should be worked with." DLH

"The audit is self-retrospective and encouraging." KMD

"The communication chapter is what I considered one of the most important chapters. The very day I worked on this chapter, there was a communication failure between the regional supervisor and myself." JRB

"The management audit is helpful in alerting me to what should be done." RRD

"I found the subjective test very interesting and the formalized method of decision making will prove useful." FFJ

"The subjective portion was time consuming but very necessary to fully understand Lesson Three." KME

"Hard. Challenging. A good exercise." PED

NAME________________ Answer Sheet
Lesson Three
To Be Sent In

LESSON THREE

SUPERVISORY MANAGEMENT IN THE WATER AND WASTEWATER FIELD

I. Objective Test for Lesson Three---complete this section
II. Subjective Portion
    Part I. Problem-Solving
    Part II. Audit

STUDENT'S NAME________________________________

ADDRESS________________________________

____
CITY STATE ZIP

Even though this will be returned very shortly to you don't wait to get started on the next lesson. Be sure to jot down any item you wish to communicate to us.

Finished? Then just send this to:

Self Study Course Coordinator
432 Eppley Center
Michigan State University
East Lansing, MI 48824

OBJECTIVE ANSWER SHEET
(circle the correct answer)

1. a b c d
2. a b c d
3. a b c d
4. a b c d
5. a b c d
6. a b c d
7. a b c d
8. a b c d
9. a b c d
10. a b c d
11. a b c d
12. a b c d
13. a b c d
14. a b c d
15. a b c d

	PASSING		NOT PASSING
Objective Test Score Number Right:	15 14	13 12 11	10 9 8 7 6 5 4 3 2 1 0
Subjective Portion			
Part I	Superior	Satisfactory	Not Satisfactory--do over
Part II	Superior	Satisfactory	Not Satisfactory--do over

Note: BOTH the Objective Test and the Subjective Portion must fall into the Passing category for you to receive credit for this lesson. If either or both parts are NOT acceptable, please rework that part to receive credit. IF YOU HAVE ANY QUESTIONS, PLEASE DO NOT HESITATE TO WRITE IMMEDIATELY.

OBJECTIVE TEST: LESSON THREE

(This covers Sections 1 and 2 of Lesson Three, and the Textbook Chapters 5 and 6
Place answers on the sheet provided preceding questions)

1. In case of doubt, too much repetition is better than too little.

   a. True
   b. False

2. Getting the facts is part of which step in problem-solving?

   a. defining the problem
   b. analyzing the problem
   c. developing and evaluating the alternatives
   d. selecting the alternative

3. Another name for the informal communication channel is ____________.

   a. the organization chart
   b. the memo
   c. the grapevine
   d. the weekly staff meeting

4. The more technical the language, the more certain communication is to be accurate and understood.

   a. True
   b. False

5. The barrier to communication which results from misunderstandings over what actually has been communicated and is often unrecognized may be described as an obstacle resulting from ______________.

   a. status and position
   b. resistance to change
   c. language
   d. employee indifference

6. There is no such thing as a riskless decision.

   a. True
   b. False

7. "Timing" should be considered under which phase in the problem-solving process?

   a. defining and analyzing the problem
   b. developing the alternatives
   c. evaluating the alternatives
   d. selecting the alternative

8. Constructive feedback, as described in your manual, is evaluative, not just descriptive.

   a. True
   b. False

9. Communication (often inadequate) which involves the implementation of changes is often viewed with ____________ on the part of employees.

   a. suspicion
   b. relief
   c. indifference
   d. disbelief

10. Consideration of the impact of an alternative upon individuals, personnel and the organization is part of which problem-solving step?

    a. first, definition of the problem
    b. second, analysis of the problem
    c. third, formulation of alternatives
    d. fourth, analysis of alternatives

11. Decision making affects the supervisor in several ways, not only in making decisions, but also in the training of subordinates to make decisions.

    a. True
    b. False

12. The most frequent cause for the formation of rumors, as given in the text, is____.

    a. uncertainty
    b. fear
    c. malicious destruction
    d. wishful thinking

13. One aspect of the communication barrier of status and position is that the supervisor and the subordinate are 'coming from' different parts of the organization--hence, their viewpoint is different.

    a. True
    b. False

14. One of the 'problems' as listed in the manual under 'problems in problem-solving' is that of failure to consider all of the adverse consequences which might result from a selected alternative.

    a. True
    b. False

15. Taking no action at all is one alternative in many problem-solving situations and should be considered as such.

    a. True
    b. False

* * * * * * * *

This is the end of the Objective Test, NOW, go right on to the Subjective Portion...

NAME______________________________

Lesson Three
Subjective Portion
To Be Sent In

SUBJECTIVE PORTION, PART I.

Part I. Wilbur wants to make some changes at the River City Utility. As one of these changes, he wants to install a new type of sludge flow meter--one which will not need the attention of Ron or Gary, or even John Whipple. This seems like a simple, even desired change, but it is going to involve some different techniques. Help Wilbur implement this change WITHOUT a repeat of his prior disagreeable experience. What communication techniques should Wilbur use? Solve this situation for Wilbur, using the Management Systems Approach as it has been described in Section 1. The five steps in this approach are:

1. Define the problem and objectives
2. Summarize management assumptions
3. Develop solution approach via alternatives
4. Evaluate all alternatives
5. Recommend and implement course of action chosen

YOU MAY USE THE REST OF THIS SHEET AND ANY ADDITIONAL ONES AS NEEDED.

When you have completed Part I, go right on to Part II which is another portion of the Supervisory Management Audit....

NAME______________________

SUBJECTIVE PORTION PART II.

SUPERVISORY MANAGEMENT AUDIT ANSWER SHEET

(Place your answers to the questions on the following pages on this sheet.)

Part II.

A. Objectives

	YES	NO	NOT APPROPRIATE
1.			
2.			
3.			
4.			
5.			
6.			
7.			
8.			

B. Planning

	YES	NO	NOT APPROPRIATE
1. a			
b			
c			
d			
e			
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
12.			
13. a			
b			
c			
d			
e			
f			

	YES	NO	NOT APPROPRIATE
13.			
14.			
15.			
16.			
17.			
18.			
19.			
20.			
21.			
22.			
23.			
24. a			
b			
25.			

C. Organization

	YES	NO	NOT APPROPRIATE
1.			
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
12.			
13.			
14.			
15.			
16.			

SUPERVISORY MANAGEMENT AUDIT

FOR

WATER/WASTEWATER TREATMENT FIELD

PREPARED BY:

DR. OMAR KEITH HELFERICH

CONTENT CONSULTANT

INSTRUCTIONS: In this lesson, you will find the first portion of the management audit. The following lessons continue this audit.

To complete this audit, therefore, you go through and read each question. Then, on the answer sheet located ahead of these audit questions, you are to mark your response. BE HONEST--this audit is for your benefit.

A. Objectives

1. Does your group have defined objectives?
2. Have written objectives been prepared for the group?
3. Are the objectives distributed to all subordinates?
4. Do the subordinates understand all of the objectives?
5. Are the reasons ("why") for the objectives understood?
6. Are the objectives reviewed and updated at least twice per year?
7. Do subordinates participate in setting the objectives?
8. Can you and your superior(s) measure and judge the level to which the objectives are achieved?

Revised September, 1977

B. Planning

1. Do you plan for:

    a. a week
    b. a day
    c. one shift
    d. a month
    e. longer than a month

2. Are you informed concerning the long-range plans and objectives of the organization?

3. Are your subordinates fully informed of the plans for your group or department?

4. Do you have policies, procedures, and methods written to assist in guiding you in your responsibilities to carry out top management objectives?

5. Do you utilize a budget stated in time, material, money, or other units?

6. Do you assist in the preparation of the budget?

7. Are results compared with the budget to study and analyze the variations?

8. Do you make a projection of the future to forecast the equipment, space, material, etc. which your group will require?

9. Do you make a projection to forecast the number and qualifications of employees?

10. Are you familiar with the trends in wages, fringe benefits, and costs?

11. Do you check with available staff specialists to prepare forecasts?

12. Do you consider the tactics of timing, joint action, and approach in implementing changes in developing your plans?

13. Do your plans consider utilitation of resources:

    a. tools and equipment
    b. work methods and processes
    c. space
    d. materials and supplies
    e. supervisory time
    f. employee time
    g. full utilization of work force

14. Do you attempt to make the new employee's transition as smooth as possible?

15. Do you do on-the-job training yourself and/or assign this duty to a qualified subordinate?

16. Are subordinates encouraged to take advantage of training opportunities?

17. Do you formally evaluate your subordinates at least annually?

18. Is a formalized system of evaluation used (a merit rating or performance appraisal system)?

19. Is an appraisal form utilized for performance evaluation?

20. Do you personally perform an appraisal interview with each subordinate?

21. At the close of the interview, do you make certain that the employee has a clear understanding concerning his(her) rating?

22. Are employees generally promoted from within the group?

23. Are seniority, merit, and ability considered as criteria for promotion?

24. Do you attempt to ensure that wages paid in your group are equitable:

    a. internally within the group.
    b. externally with the going rate for similar jobs in the organization and community.

25. Do you review wage and salary information collected by personnel and/or yourself?

C. Organization

1. Are the jobs of the group clearly defined?

2. Are the jobs assigned?

3. Is authority adequately delegated?

4. Are two-way lines of communication established between yourself and your subordinates?

5. Does each employee have a single immediate supervisor?

6. Do you supervise a reasonable number of employees?

7. Does each employee know what standards are expected of him(her)?

8. Are you inclined to assign the more difficult tasks to the most capable employee?

9. Is your group attached to the organization in a line capacity? in a staff capacity?

10. Is your position described in an organization manual?

11. Are activities grouped by function?

12. Do you have a subordinate who is currently qualified to take over your position?

13. If you do not have a qualified understudy for your position, are you training someone as an understudy?

14. Have organization charts, manuals, and position descriptions been prepared?

15. Do you know the leader of the informal organization within your span of control?

16. Do you actively work with and build good relations with the informal leader?

* * * * *

This concludes the audit questions for this lesson. Other audit questions will be presented in the following lessons.

This concludes the Subjective Portion for Lesson Three. Please complete the Evaluation Sheet on the following page and send your lesson in for correction.

NAME ________________________

Lesson Three
Evaluation Sheet
To Be Sent In

EVALUATION SHEET - LESSON THREE

Please take just another minute to complete this evaluation sheet. YOUR ANSWERS HERE WILL PROVIDE US WITH YOUR OPINION OF THIS LESSON, and are one of the prime means that we have for improving the course.

1. How accurate and appropriate did you find the case example for Section One? (Circle the best answer or write your own)

   Very realistic — So-so, at least it did not turn me off — Basically inappropriate

   Other:

2. What about Section Two?

   Very realistic — So-so, at least it did not turn me off — Basically inappropriate

   Other:

3. What part did you find most interesting?

4. What part did you find least interesting or dislike?

5. How is the objective test going?

   Still too hard — OK — Still too easy

6. What did you think of the subjective portion of this lesson?

7. Have you encountered similar situations to those as discussed in these sections?

   NO. Yes; could you describe them?

8. Other comments?

We really appreciate these evaluations and comments.

LESSON FOUR

Planning and Organizing

Section 1: The Manager and Planning
Assigned Text Reading: Chapters 7 and 8

Section 2: The Manager and Organizing
Assigned Text Reading: Chapters 9, 10, and 11

A master plan for a water utility establishes objectives for the utility as a whole for a substantial future time period, together with the steps whereby these objectives may be attained.

Charles W. Keller, active member of the American Water Works Association, Journal, AWWA, February 1972, p. 72.

LESSON FOUR - SECTION 1

THE MANAGER AND PLANNING*

Wilbur and Jack Watson were having one of their weekly meetings. They'd just started and were discussing general plans for the coming months.

"You know, Jack," Wilbur commented, "for someone who has just lost three top men, you have seemed remarkably calm and organized these past few weeks."

"You mean, my fortune in luring you away from Deephaven," Watson grinned.

"More than that, " Wilbur persisted, "why, take a look at your desk. Even in the midst of a busy day, it's organized and I'll bet you could find anything I asked for within ten seconds. When I think back to a former boss of mine...did I ever tell you about Ferguson Howe?" Watson shook his head and wrinkled his forehead, trying to recall ever meeting anyone by that name.

Wilbur continued, answering Watson's unspoken question by saying that to his knowledge, Howe had left the water/wastewater industry.

> "It was back when I had received my first job in supervision. I was employed as a maintenance supervisor at a sewage treatment plant. The mission was to schedule routine overhaul and perform preventive maintenance. Since our staff was small, some of the work was performed by outside commercial vendors under contract.
>
> My supervisor, Ferguson Howe, was our assistant manager. His staff coordinated internal and external schedules and expedited contractor parts deliveries. We were what's commonly called a paperwork organization.

**Used with permission of Robert D. Joyce, Innovative Management, Reseda, California, 91335.*

I've heard it said that every manager is different in terms of his leadership style and the supervisory methods and practices he employs. Ferguson Howe certainly was different. Once, when I had been standing in front of his office at the City Hall waiting for him to complete a phone call, he motioned to me to come in and sit down.

His desk was covered by papers, reports, or action memos. He listened on the phone while the other party talked, signing letters at the same time. A small bulletin board above his desk advised: "Take Action--Now." It had at least a dozen notes pinned to it. While listening, he added another.

Presently, Howe had put his hand over the phone and had turned to me. "This is Fogerty calling from the new pump station," he said. "The last efficiency test was only a partial success. As a result, station reliability is now critical. I know that, but Fogerty insists on giving me minute by minute details on the entire test proceedings."

Returning to the phone, he removed his hand and resumed the conversation. "OK, OK Fogerty, I'll check out that instrumentation with the contractor and call you back. Yes... All right... Will do... Bye."

Howe had hung up the phone and turned to me. "Do you know what I like about you, Wainwright?" He didn't give me time to answer. "You listen when I give you a job. Then you do it. Then you come in and tell me it's finished. You don't tell me how you did it. I wish the rest of the boys could develop that ability. I don't give a damn for the details."

Howe's secretary, Andrea, had interrupted at this point. "You have two more calls on hold, Mr. Howe; Mr. Brooks in Washington wants the latest fiscal year cost projection for the construction grant. Also, Mr. Davidson of Loomis Manufacturing wants to give you the revised delivery schedule for the phosphate removal equipment."

Howe just shook his head in despair, excused himself, and went back to the telephone. I sat quietly and listened.

After a minute or so, Howe had put his hand over the receiver and called Andrea. "Get Reedly and Smith in here."

Reedly and Smith arrived moments later and Howe motioned to them to sit down. The three of us sat and listened. Fifteen minutes passed before Howe completed the last of the two calls.

"Smith," he said at last, "you know that cost projection which you put together for Brooks in Washington? Well, update it based upon last month's figures. This time, break out the costs a little better so I'll have more data in case Brooks tries to snow me with his accounting double talk."

Smith had left.

Turning to Reedly, Howe continued. "Davidson has new delivery dates. Plug them into your PERT planning and control schedule and tell me what effect the change will have. By the way, when you finish, bring in a marked up PERT diagram so I can have back-up for my next battle with Davidson."

Reedly had left.

"Now then, Wainwright, what did you want to see me about?" said Howe, appearing somewhat more relaxed.

"Please sign this purchase order," I replied. "No reason to read it. It's a reorder on parts you previously authorized." Howe scribbled his signature and I grabbed up the document to leave.

"Like I said, Wainwright," he had repeated, "I wish the rest of the boys had your ability. I could get a lot more accomplished."

As I left his office, I remember the phone ringing again.

"Now you see what I mean, when I admire your organization," Wilbur concluded, nodding at Watson. Watson could only sit there and shake his head.

* * * * * *

You probably do not have such challenges as are facing Watson and Wainwright at the moment, or even have the frenzied existence of a Ferguson Howe. However, big or little, all managers need good plans and good organization to execute those plans. What do you expect to find in this portion on planning and organizing? Look over the Questions and then complete the assigned reading in the text. Note that two chapters are assigned for this first section.

THE MANAGER AND PLANNING

What are your plans for the coming weekend? Or maybe, where are you planning to go on your vacation? No one has to tell you how important plans are--but sometimes, on your job with the utility you may get the feeling that too many plans are demanded. You may be asked to plan ahead, when the future is still a mystery. The purpose of the first portion of Lesson Four is to review some of the reasons for planning. You will view planning from the angle of organizational objectives, and study the premises upon which plans are based. Once those plans are made, you will then study the types of policies, procedures, and methods which are used to make those plans go into action.

Planning involves consideration. Consideration of the objectives of those both inside and outside the utility is essential to the planner. Management by objectives is the "extension of the service objectives to operating units in the firm." These objectives are narrowed down to become the specific goals of certain areas within the utility.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Importance of Planning?

- That planning is important to the supervisor, particularly the part you might play in the future of the utility?

What is Included in the Planning Period?

- That there are different time spans for different types of plans?

How Plans are Communicated?

- The rules regarding the communication of plans? Be prepared to understand the plan and inform your subordinates about them.

How to Set Objectives?

- The difference between primary and secondary objectives?
- The purpose of primary and secondary objectives?

The Relationship Between Policies and the Supervisor?

- The differences between policies, procedures, methods, rules, and budgets?
- What is meant by policies?
- The origin of policies?
- The reason for written policy statements?
- Recognize that the supervisor's role will call for, primarily, the application of existing policies for decision making? Could you use procedures to assist in implementing policies? Have you proposed any procedures?

The Relationship Between Procedures and the Supervisor?

- What is meant by procedures?

The Relationship Between Methods and the Supervisor?

- What is meant by methods?
- How the supervisor's role is simplified by the use of standard procedures and methods? Do they leave you free to perform other supervisor-oriented tasks connected with your job in the utility?

The Relationship Between Rules and the Supervisor?

- What is meant by rules?

What is Meant by Repeat-Use or Single-Use Plans?

- The difference between repeat-use and single-use plans and the purpose of each?

The Relationship Between Budgets and the Supervisor?

- The reasons for the supervisor's participation in the preparation of the budget?
- The purpose of the budget for the supervisor? Acquaint your staff with those portions of the budget for which you are responsible.

The Rule of Forecasts for the Supervisor?

- Some of the technical considerations which are required in supervisory forecasting?
- Will changing federal or state requirements cause changes in record keeping, chemical use, plant capacity, etc. in the future?
- The description of forecasting as an art?

The Relationship Between Planning Tactics and the Supervisor?

- Some tactical considerations affecting planning?
- The value of joint action?

The Role of Resource Planning for the Supervisor?

- The types of resources which must be planned for?
- The importance of timing in the planning function?

THE MANAGER AND PLANNING

Assigned Text Reading:
Chapters 7 and 8; The Planning Function, and
Planning at the Supervisory Level

Treatment plant Superintendents, crew chiefs or personnel managers may feel that this lesson on planning and organizing is not particularly appropriate for their area of responsibility. However, remember that all supervisors are involved with some elements of planning and that they might very possibly be promoted to a level where planning is of primary importance.

KEY POINTS

Planning Responsibility

All managers have responsibility at some point for planning. Notice also that planning, at the top or beginning of the managerial functions, sets the pace for all the following functions. They may work in a circular form, but this is where the circle starts.

Plans are not limited to a single time period. Usually, in any organization there are plans within plans. The plans of any department or division of the utility should be integrated and known to the upper management responsible for many of the long range plans. Furthermore, department or division plans should be communicated downward as well as upward. If possible, employees should have a say in the supervisor's plans. If this is not feasible, the more open the communication concerning the plans, the more of a team effort is usually generated in the adherence to those plans.

Setting Objectives

Setting objectives is considered the first step. As noted in the text, broad organizational objectives are termed primary objectives, while those of individual departments are known as secondary objectives. Middle managers would usually be involved with secondary objectives, but these must fit into the organization's goals. An example of a primary objective would be the acquisition of a plant site to serve an annexed community. A secondary objective would be the design, construction, and staffing of the facility. For example, the personnel manager might be called upon to prepare job specifications, advertise for, and then interview potential employees for the new plant. His objective would be to have the staff hired by the time the plant was ready for testing and start-up.

The Planning Function

There are a number of terms which tend to get a bit confusing, so let's set them out in order now.

OBJECTIVE--the goal, or end result, toward which all plans and activities of the organization are directed.

Charles Keller, in his article* (see Future Reference), notes both primary and secondary types of objectives (he calls them "broad and specific objectives"). The broad objectives deal with "utility's ability to provide an adequate quality and quantity of water to the population in the area it serves, or expects to serve."

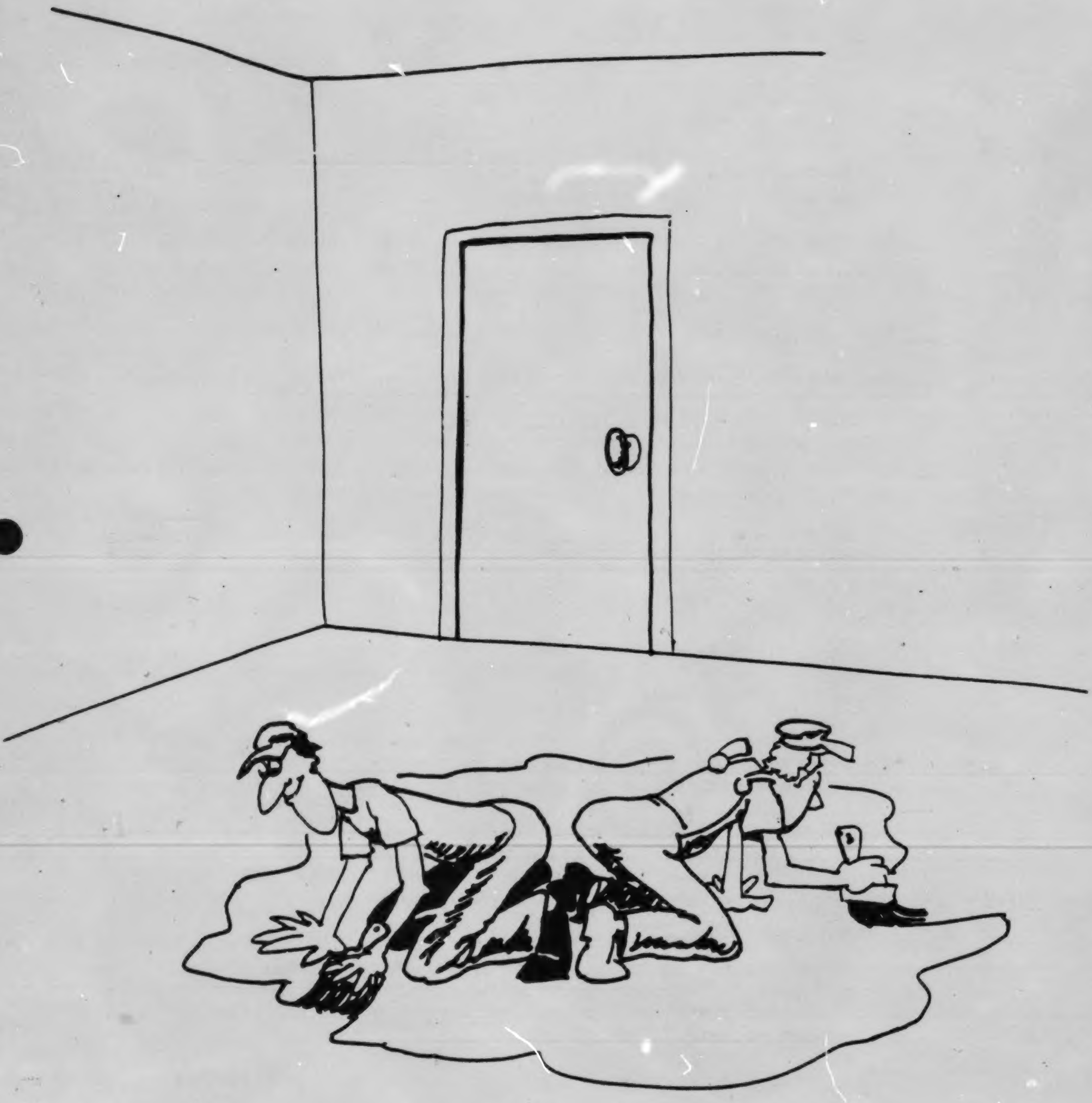
Example of a primary water/wastewater objective: annex adjoining community and provide water/wastewater services.

Example of a secondary water/wastewater objective: install necessary water and sewer lines to serve the annexed community.

Objectives relate to future plans or goals, hence the supervisor must be continually thinking ahead.

---

*Keller, Charles W., "Physical and Financial Master Planning," Journal, American Water Works Association, February, 1972, pp. 71-74.



Timing is always critical when plans require joint action.

Here are some questions to ask yourself about your future objectives:

___ 1. Have you attempted to forecast potential future developments such as position openings, legislation, demand, or other situations which could lead to future problems or opportunitites?

___ 2. Have you established your objectives for the coming year?

___ 3. Have you defined the objectives that you want reached in the next few months and have you developed an appropriate measurement to know when they are reached?

___ 4. Have you determined a plan of action to meet these objectives?

___ 5. Do you have a time schedule laid out for reaching your objectives?

___ 6. Have you clearly defined the work assignments for your employees?

___ 7. Have you delegated decision making to the appropriate employees?

___ 8. Have you worked to maximize the work flow?

___ 9. Have you set measurable standards of performance for your personnel so they are able to determine their progress?

___10. Do you have alternative courses of action with their potential consequences if your initial plan falls through?

POLICIES--broad guides to thinking, general statements which channel or guide the thinking of managers responsible for decision making. Have definite limitations at each end.

Example of policies for a water and wastewater utility: education payment or reimbursement, sick leave, holidays, and hiring all employees through a central personnel function.

PROCEDURES--guides to action, not guides to thinking. Procedures define a chronological sequence of definite acts which are to be performed. They define a series of steps to be taken and note the sequence to be followed.

Example of a procedure: how to determine which employees are eligible for time off for educational programs and reimbursement for costs. This may be done, for example, by seniority or any employee with more than one year of satisfactory employment,eetc.

Another example of a procedure would be that a supervisor must fill out a requisition form specifying the requirements of a job before personnel will attempt to screen any job applicants.

A procedure might also list the steps to be taken in accomplishing a task, backwashing a filter, start up a treatment plant, install a fire hydrant, or other job.

METHODS--plans for action, even more detailed than a procedure. A method is concerned with only a single step, not a series of steps. It states specifically how it is to be performed.

Example of a method: the description of specifically how to fill out the job requirement form.

Another example would be the description of how a plant superintendent should interview a prospective shift operator.

RULES--regulating principles or directives which must be consistently applied and enforced by the supervisor.

Example of a rule: a directive that states that job specifications for each position must be posted at certain locations within the water and wastewater utility one month prior to advertising, or looking outside the utility, to allow all current eligible employees opportunity to be considered.

BUDGETS--plans which express anticipated results in numerical terms, such as dollars and cents, man-hours, kilowatt hours, or units to be produced.

Keller generally discusses the objectives dealing with capital improvements and financial planning. He notes that a water utility should be self-sustaining, in regard to its financial policy.

Select the aspects to remember when constructing a financial plan for the utility--place an X in front of those which you think are necessary.

____financing methods, such as issuance of bonds, and construction from annual net revenues

____estimates of future revenues and expenditures

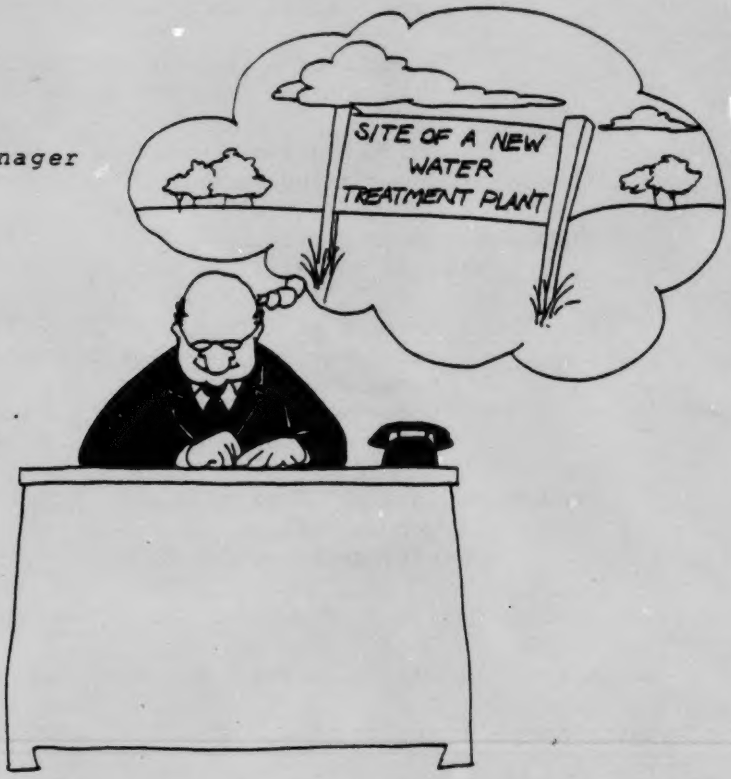
____inflationary trends

____capital requirements for replacement of SMALL items

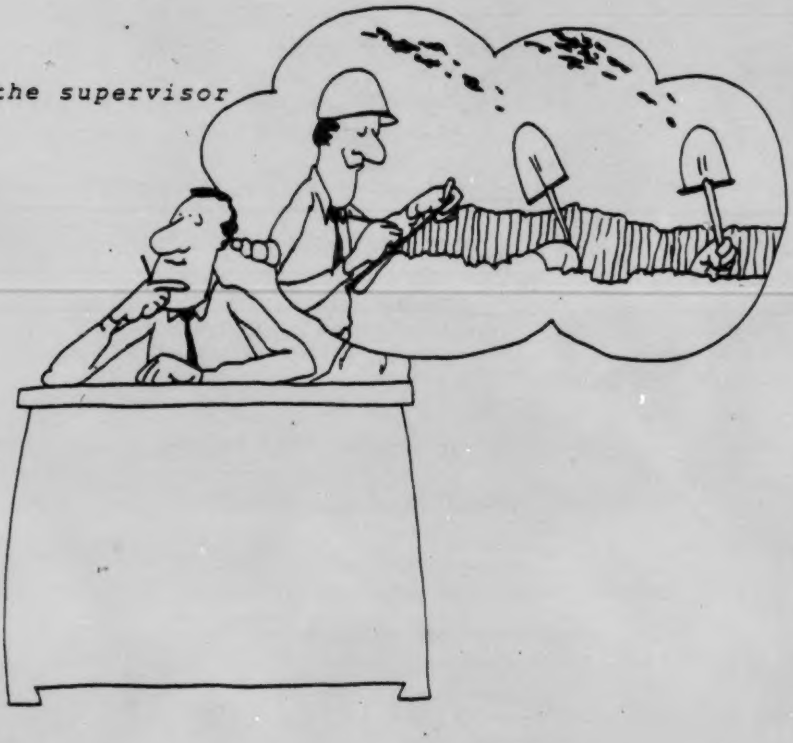
____debt service on existing bonds

If you checked all of the items, you were correct. Each of these factors, as well as some others, should be considered when constructing the financial plan for a utility.

Long range planning by the manager


SITE OF A NEW WATER TREATMENT PLANT

Short range planning by the supervisor



Does that make it clearer? Less confusing? Notice some of the different types of each, such as standard policies and methods, or repeat-use and single use plans. Also, take note of the dual functions of the budget. When it is being drawn up, it is in the planning function. Once it is drawn up, it becomes a control tool, a statement of expected results.

OVERVIEW OF PLANNING

1. Take time to plan (and provide for that time).
2. Have clear, simple plans—in writing.
3. Obtain all needed approvals.
4. Use the experience of others in developing plans.
5. Develop plans with your employees (their participation now will help those plans to be carried out).
6. Try a test run of your plans (whenever possible).

Planning on the Supervisory Level: Forecasting

Take note of the types of forecasting usually required by the plant superintendent: capital equipment, maintenance supplies, staff, wage patterns, and even entire departmental changes.

Planning Tactics

It has been said that the difference between strategy and tactics is that the strategy tells you how to win the war and tactics tell you how to fight the battle. Every supervisor knows that there are going to be battles in the attempts to carry out the plans and here are some weapons to use.

First, timing. The supervisor should be aware of when it is wise to speed into action, and when it is prudent to take it slow and easy. This is particularly illustrated in the text in the situation of adapting to change.

Second, single or joint action. Note the advantages of working together, particularly when attempting change.

Planning for Resource Utilization

What is the supervisor's most important and valuable resource? That's right—the people being supervised. Most of the other resources available to the supervisor are connected to those people in some way. Tools and equipment, work methods and processes, space, paper, pencils, paint, rope, and even (or should we say especially) time. Time refers both to the employees' time and the supervisor's time. Resource utilization here means to make the best use of everyone's time.

* * * * * * * *

FUTURE REFERENCE

Baker, James B., "Management Accounting Tool Aids," Journal, American Water Works Association, November 1971, pp. 692-695.

"Management accounting is also a tool which is connected to finances, but is not as dependent on the funds as on how the funds are allocated (and when, and where, and to whom...)." The author of this article, entitles, "Management Accounting Tool Aids," is James B. Baker who works for Lybrand, Ross Bros., and Montgomery in Los Angeles.

Hembree, James W. "Planned Measurement of Meter Repair and Maintenance Costs," Journal, American Water Works Association, Vol. 68, No. 10, October 1976, pp. 504-508.

A look at costs and benefits is taken, using meter repair as the specific subject. Is it sometimes more economical to replace old worn meters? Read this survey of meter maintenance practices to find out.

Joint Discussion: Equipment Selection (authors: Grunwell, J.A. Wood, D.A. Whitney, J.B. Woods, J.R. Fielding, D.S. Fulton, and W.H. Powell), Journal, American Water Works Association, March 1972, pp. 136-142.

"This article is really a large group of short articles on the subject of equipment selection. Some of you in this course may not be currently in a position to select equipment--but in the future you may well be. And, even if you do not have the final 'say so,' you will possible be asked for your opinion on equipment needs.

Kazimer, Leonard J., Principles of Management, A Programmed Instructional Approach, 3rd edition, New York, McGraw-Hill Book Company, 1974, pp. 60-87, 90-98.

"The process of planning begins by designating organizational and unit objectives. In addition, we must consider the various possible strategies or course of action that will lead to the achievement of these objectives."

"After organization objectives have been identified, the function of planning is concerned with the selection and definition of the policies, procedures, and methods necessary to achieve overall organizational objectives. Each of these 'levels' of planning activity is considered in turn in this chapter. Whether it be at the level of determining policies, procedures, or methods, the process of decision making is an essential component of the planning function."

FUTURE REFERENCE (continued)

Keller, Charles W., "Physical and Financial Master Planning," Journal, American Water Works Association, February 1972, pp. 71-74.

Charles W. Keller presents two objectives which are vital to water utility master planning--physical and financial plannings. Even if you are not shouldering the total plan for your utility, portions of this type of planning apply to all water and wastewater utilities. His breakdown fall into two major objectives--the physical aspect, and the financial aspect. Both of these objectives should be generally correct, if the utility is to provide adequate service for its customers.

Kollar, K.L., and Brewer, R. "Industrial Development Through Water-Resources Planning," Journal, American Water Works Association, Vol Vol. 67, No. 12, December 1975, pp. 686-690.

You may have thought that your task of planning for the coming year was a lengthy one--if so, try working out plans for the "whole river basins, provinces, and even countries." Yet this type of planning must be done if we are to obtain a view of future water needs.

Lazzaro, Victor, editor, Systems and Procedures: A Handbook for Business and Industry, Prentice-Hall, Inc., Englewood Cliffs, New Jersey, 1968, p. 262.

"--budgets and cost control measures are used to determine what costs should be, the nature of differences from what the costs actually are, their cause and responsibility, and to provide the necessary information for corrective action."

McWhinnie, Robert C., and Spaulding, J.M., "Responsibility Budgeting: A Management Tool," Journal, American Water Works Association, May 1972, pp. 275-279.

"Planning and controlling (familiar words, by now) may be accomplished through management. THAT you have learned through other lessons. BUT the tools for planning and controlling are not limited to managerial skills. Finances are quite the tool for planning, and everyone of us is probably more than enough aware of how finances, in part, control our lives. This article discusses how finances are able to be budgeted in a way to both plan and control."

FUTURE REFERENCE (continued)

Sayles, Dwight R. and Stratton, Roel K., "Some Sound Basic Steps for Financial Planning," Journal, American Water Works Association, Vol 69, No. 4, April 1977, pp. 200-202.

To plan properly, the manager needs a basic body of information about the needs and demands. This is especially crucial to the expanding utility, and these authors offer an outline as a guide for such planning

Ward, P.S., "What 208 Planning Can Do: A Local and a Federal View," Journal, Water Pollution Control Federation, Vol. 48, No. 7, July 1976, pp. 1692-1696.

Again, planning for the future is only as valid as the information gained about the future. This article offers suggestions based on the planning program as outlined in Section 208 of PL 92-500 and its implementation.

MINI REVIEW: SECTION 1

When you feel comfortable with the information in the text, take this review quiz

Use this series of questions to help you review the planning section of Lesson Four, before you advance to Section 2 on Organizing. Remember, this is for your benefit---check your answers with the answers at the bottom of the page. Do not send this quiz in.

_____1. The supervisor and middle manager are generally involved with

a. shorter plans, up to a year in duration
b. longer plans, usually more than a year
c. both long and short term plans, on an equal basis
d. very few plans, since they operate on the other four managerial functions

_____2. A guideline which lasts for a set period of time is descriptive of a

a. plan
b. procedure
c. budget
d. rule

_____3. The first step in planning is

a. drawing up the budget
b. setting standard procedures
c. setting objectives
d. keeping the rules

_____4. Select the most critical and essential resource in the planning category from those listed below.

a. budget
b. manpower resources
c. space
d. supervisory time

_____5. A supervisor's most important resource is considered to be

a. his tools
b. his time
c. his employees
d. his finances

* * * * *

ANSWERS: 1) a 2) c 3) c 4) b 5) c

LESSON FOUR - SECTION 2

THE MANAGER AND ORGANIZING

Wilbur and Jack Watson continued their meeting as Jack introduced the need for cost reduction.

"Wilbur, I can't stress enough the pressures I am receiving down at the city hall to reduce costs. The city budget indicates a deficit for the next several years. Every department is being expected to cut at least ten percent this year. As you know, supervisors play a key role in any cost reduction effort. Everything you do has an effect on the cost of running your operation."

"Do you have any suggestions, Jack?"

"I don't have the answers, but one sure way to hold the costs down is to be constantly aware of the fact that every bit of labor, material, equipment, supplies, time, space, power and other operating necessities has a direct dollar and cents value. All these factors that effect cost and efficiency are interrelated.

"Jack, I don't think I can see offhand any areas where we can easily reduce these factors."

"That may be right, Wilbur. We have to get smarter and be able to recognize the difference between an economical and wasteful use of labor, material, and facilities. Just reducing the amount of everything that is used is not necessarily a waste reduction; in fact, it might turn out to be a very wasteful practice."

Wilbur thought for a moment and then added, "I guess an example would be if we attempted to establish an expensive maintenance program that caused our labor costs to exceed the savings in repairs."

"Exactly, Wilbur, and the other extreme would be reducing the staff to a point where very little preventive maintenance got done which could cause our increase in repair costs to exceed the reduction in staff costs."

"This sounds like a tough problem and it certainly is one that I haven't had to be too concerned about before my new responsibility," reflected Wilbur.

"I'll help you as much as I can," added Jack. "In fact, here is a copy of some pointers on the subject of cost reduction that I have found very helpful. (Jack handed Wilbur several pages of notes on cost reduction.) Jack then said, "Wilbur, once you have reviewed these comments, I want you to organize and plan an approach to achieving some significant cost reductions for this year. I want to know how you'll start the program, who'll be involved, what areas you'll investigate, and any other areas that you feel should be spelled out in a good organization and plan for this program."

"I can't emphasize enough how important this is! We have to cut costs at least ten percent!"

The meeting ended as Wilbur assured Jack that he would get back with the organization and plan for the cost reduction program by their next weekly meeting.

Continue reading this case study by examining Jack Watson's suggestions on the following pages.

MY JOB COST REDUCTION

by Jack Watson

Eliminating Costs in a Water/Wastewater Treatment System

Elimination of things which cost money is one sure way to save money. The way I can trim the unnecessary or extra-complicated procedures is to train myself to look for possible elimination of costs when I analyze my department's wastewater treatment operations.

In many instances, thorough analysis of an operation and its relation to the overall plant operation will show it should be eliminated. From time to time in the past, certain operations, parts, personnel, or procedures which were designed to serve some immediate purpose crept into the picture. After that purpose had been served, no one remembered to take them out again.

Finding Forgotten Costs

These forgotten costs are present in almost every department. Sometimes they are so obvious that I just can't see them. When I get used to doing a certain job a certain way, I don't realize that it may be wrong. But, when I have started from scratch and analyzed an operation, I have been able to see where the particular operation or handling was unnecessary and wasteful.

I try to stand back and look at each small unit in my department from the standpoint of a stranger--to study the problem without depending upon any preconceived ideas. I question everything that is done; I ask myself whether it can be eliminated, simplified, or combined with another operation.

WHERE TO LOOK

1. Eliminate idle time.

   Time which is not productive is idle. I can often eliminate such idle time by planning our operations in proper sequences. When a certain type of idleness due to waiting for tools, materials, parts, or instructions occurs frequently, I can trace the situation back to the basic planning--the routing, scheduling and dispatching--which probably needs some adjustments to be practical to our wastewater treatment plant operations.

2. Eliminate handling time.

   A tremendous amount of time and effort--all of which costs money--is spent in picking up materials, moving them, putting them down, lifting them up, and carrying them to some other place.

3. Eliminate indirect costs.

   Whenever indirect labor or materials are not essential to the effective and efficient utilization of direct labor or direct materials, I remove them from our operations.

   A good example is a form which was designed to provide a certain type of information, possibly duplicating another form. After the form has served its purpose it should be removed.

4. Eliminate costs by combining operations or work.

   The way to eliminate such costs is by thorough planning and looking ahead to make sure that the same operation will not have to be done later in the day or week when it could be done right now.

5. Eliminate unused inventory, machines, and tools.

   Sometimes it's possible to accumulate certain equipment or machines which were installed for a specific purpose and which may never be used again in the forseeable future. If we can get such equipment removed to a useful location or charged off our account we may be able to better our budget position and at the same time contribute to effective overall management.

6. Eliminate overtime or extra costs operations.

   Plan and adjust plant operations and requirements through careful scheduling so that it will not be necessary to schedule overtime at premium rates. This will enable us to keep costs within predicted budgets easier. The same principle applies to using high-priced labor on low-skill jobs. Here we're paying a premium for the work. Eliminate such premiums and we automatically save costs.

7. Control absenteeism.

   Every time one of our workers takes a day off it disrupts our schedule and wastes money. Why do workers stay out when they're able to work? Why will some people use any excuse--from a mild headache to a flat tire--to stay home?

   Maybe they don't think their jobs are important, or maybe they figure the "City" doesn't care. Whatever the reason, it's up to me the first line supervisor to discover it so I can start to control these costly, schedule-busting absences.

It is important to convince workers that it's vitally important to them, to me, and to their fellow workers to get to work every day.

Absences cost money! Everyone knows and understands this. If possible, I show him the costs of his absence in dollars and cents. I point out that substitute workers or overtime hike operating costs. My object is to motivate my employees to want to be on the job.

I don't wait for Personnel to tell me that absences are getting out of hand. A simple calendar-type file sheet for each employee on which I mark an X for each absence gives me an individual continuing record that quickly shows any pattern that might develop. I make up monthly summaries to stay on top of the situation.

IMPROVING QUALITY PERFORMANCE

Most people are concerned with doing a good job. They tend to get impatient with management if they feel there is no interest in what they are doing. It's up to me as a supervisor to let each worker know that I'm aware of what he is doing, how he's doing it, and just how important his job is. So, what it boils down to is the supervisor promoting the idea of good workmanship to all of his employees as one means of improving the quality of operation.

I can improve quality performance within my department if I.....

1. Let each person know that I'm aware of what he is doing, how he's doing it, and just how important his job is.
2. Analyze inspection and operating reports to determine where to concentrate my efforts.
3. Make certain that workers are properly trained and understand the required standards.
4. See that the right man is in every job.
5. Inspect equipment regularly, and adhere to maintenance schedules.
6. Keep my eye on the quality of incoming parts and materials.
7. Motivate workers to exercise care in everything they do.

REDUCING MAINTENANCE COSTS

While most of the actual repair work is done by the maintenance personnel, every supervisor and every worker should be maintenance conscious.

Basic steps to be taken.....

1. Be certain that all employees are properly instructed in the use and care of machinery and equipment. When any equipment is unfamiliar to them, have a copy of the manufacturer's instructions on hand.

2. See that each employee is taught the basic care normally required by every piece of equipment he uses. Train workers to call special problems to my attention without delay.

3. Make certain all employees are properly instructed in the cleaning, oiling, and greasing of equipment for which they're responsible.

4. Be alert to the possibility of abuse to equipment such as angry hammering, forcing, and other mistreatment. Prevent workers from overloading or otherwise risking damage to machinery and equipment in a misguided attempt to increase production.

5. Check the operation of any equipment after it has been repaired to be certain it is operating properly. Also test all safety devices before certifying it for operation.

6. Have a regular schedule for inspecting machinery and equipment to be sure it's functioning properly and being cared for as it should be.

7. Take precautions to safeguard any machinery that happens to be standing idle.

8. Keep track of departmental maintenance costs. They'll tell me whether or not my program of preventive maintenance is a success.

A successful manager should be constantly on the lookout to find ways to eliminate waste by questioning the necessity of everything that is done under his jurisdiction.

* * * * *

Cost reduction appears to be an especially vital issue these days. Look over the following 'Question' Section then go on to the Assigned Reading.

THE MANAGER AND ORGANIZING

Organizing, the second of the managerial functions, "basically consists of grouping people and assignment activities so that the activities can be effectively executed." This process is the area for study in this section of Lesson Four.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Concepts of Organizing?

- How the concept, *unity of command*, relates to your supervisory role?
- What is meant by *span of supervision?*
- The factors determining your span of supervision?
- The distinction between organizational levels and the span of supervision?

The Relationship Between the Supervisor and Departmentation?

- The meaning of departmentation?
- Some of the different ways to departmentalize?

How to Assign Work Activities?

- The difficulties encountered by supervisors in assignment of tasks?

The Relationship Between Line and Staff Positions and the Supervisor?

- What is meant by the terms line and staff in this managerial context?
- The staff functions in your utility?

The Role of Understudies with that of the Supervisor?

- The supervisor's need for an understudy?
- The process of grooming an understudy?
- How to deal with reluctant potential understudies?

What is Meant by Organizational Structure?

- The reasons for restructuring an organization?
- Some of the 'ideal' aspects of an organization?

Organizational Tools of the Supervisor?

- Some organizational tools available to the supervisor?

What is Meant by an Informal Organization?

- The difference between the formal and informal organization?
- The importance of the informal group and its leaders?

The Role of the Supervisor as to Meetings?

- Several different types of meetings?
- The benefits of group discussion and how to apply them to your own situation?

The Role of the Supervisor as to Committees?

- The power of the committee as a decision maker?
- How committees should be composed?
- The limitations of committees?

The Role of the Supervisor as to Conferences?

- What is expected of conference leadership?
- The conference chairperson's role?
- What should be included in the agenda?
- The means for generating general discussion?
- The procedure for enacting business through a conference?
- The importance of follow-up?

THE MANAGER AND ORGANIZING

Assigned Text Reading:
Chapter 9, Concepts of Organizing, Chapter 10, Creating an Effective Organization, Chapter 11, Meetings, Committees and Conference Leadership

As we go from planning to organizing, the supervisor and middle manager move into areas requiring even more of their attention. Read the three assigned chapters carefully before going through this portion in the manual.

KEY POINTS

Unity of Command

The basic point to note here is that every employee should have one immediate supervisor (not two or three, or...).

Span of Supervision

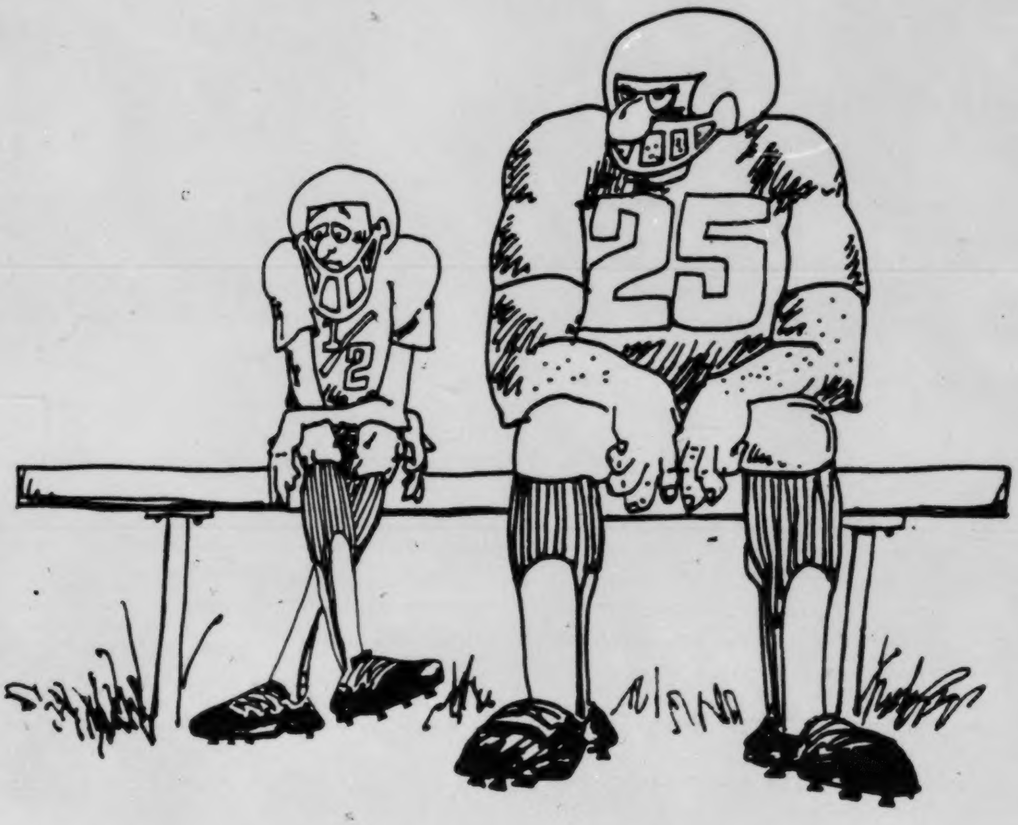
Again, there is one basic point. There is a limit to the number of employees that one supervisor can adequately handle. However, there are a number of factors influencing this number: the ability of the supervisor, the tasks to be done, the employees, the responsibilities of the supervisor, the performance standards, and the time limitations.

Now, what do you do if you have too many employees under your supervision? First, notice that this is hardly an admission of incompetency on your abilities. Out of those six factors, only one relates to the ability of the supervisor , the rest refer to the situation or the employees.

Second, solution. The suggestion from the text is to divide that wide span into several levels--selecting employees to head those levels. This is not a simple solution without accompanying problems (communication through additional levels is often apt to become distorted, for one thing), but it is certainly a solution worth consideration.

Departmentation

Notice the ways to departmentalize as listed in the text: by function, product, territory, customer, process or equipment, and time. This is a fairly standard listing, although like most lists in textbooks--other textbooks will usually vary somewhat. In the water/wastewater field, this grouping is usually by the function performed, such as distribution system or collection system treatment, plant operator, plant maintenance, laboratory, or meter reading, business office, engineering or personnel. Note that mixed departmentalization is not uncommon.



Assigning difficult tasks only to those most capable means other employees are not being adequately trained for future responsibility.

Work Assignments

There is a small, but practical section in the text devoted to work assignments. Pay particular attention to the warning concerning the assignment of difficult tasks to the most capable employees. This would appear to be the most logical choice, yet, in the long run, the other employees are not being adequately trained and prepared for future responsibility. Remember, the duty of a manager is to utilize all of the employees under his responsibility.

Line and Staff Distinctions

The text describes the staff as those engaged primarily in one activity, while those in a line capacity are in the direct line of authority running vertically throughout the organization. The staff is described as being there to provide "guidance, advice, counsel, and service to all members of the organization."

The distinction between line and staff positions is not one of superiority and inferiority, but of different purposes. In water/wastewater systems, the organization is essentially line, though staff functions such as safety, personnel, and accounting exist.

Small utilities might have a superintendent who reports directly to the mayor and who is responsible for all water and sewer service in the community. His staff might consist of employees who double as meter readers, plant operators and pump station attendants. Medium-size utilities might employ a water department manager and a sewer department manager. They could report to the mayor directly, or to a water and sewer commission. The staffs under each of these managers would be more complete and their duties more specific. Staff functions would be absorbed by the manager or provided by other city departments. In larger utilities, both water and sewer utilities should be highly departmentalized, with much delegation of authority and with their own staff positions.

Matrix Structures

The concept of matrix management has been growing over the past decade. The textbook presents matrix management as virtually synonymous with project management. As such, it is important to realize several aspects.

First, project management provides the manager with a "web" of relationships to work with, instead of the straight-forward line-staff type of structure. For many managers, this is just a more realistic picture of the type of working situation they have had all along. In any case, the manager should realize the structure of this relationship. Implications here involve setting up a chain of command (who is to report to whom?) and providing for contacts where none have been previously set up (or often even needed).

Second, the manager should note that, regardless of the objectives of his or her unit, other objectives connected with the project itself are now also in existence. Unless these project objectives are communicated to the employees, their motivation for the project may be far less than the manager expects or realizes.

Third, the organizational layout involved with matrix management cuts across the normal communication channels. Additional care must be taken to establish adequate communication in matrix management.

Comparison of the Functional Versus the Matrix Management Approach

By now, you may be confused as to the difference between the two approaches presented in your text, the functional approach and the matrix approach. Both appear to utilize people according to their specialties and abilities. Some differences between the two are noted on the next page.*

---

*as noted by Gray, J.L. "Matrix Organizational Design as a Vehicle for Effective Delivery of Public Health Care and Social Services," Management International Review, 1974, Number 6, pp. 73-82.

1) Bureaucratic structure under the functional arrangement is considered rigid and predictable; the matrix form is flexible and unpredictable.

2) Bureaucracy is generally organized around functions and hierarchical positions; matrix organizations are organized around problems.

Generally, one finds a middle-ground type of situation in most organizations, utilizing some aspects of the bureaucratic structure and some of the matrix problem-solving characteristics. The ultimate "purpose of the matrix form," according to Gray, "is the assemblage of 'different' resources to bear upon a common problem or objective." (page 76). As much as this is possible for you, as a manager in a water or wastewater utility, the better it will be in using all the resources at your disposal for problem solving.

The Understudy in the Delegation of Authority

Previously, the delegation of authority was considered more on a work or job/task basis. Here it is considered on a personal fill-in area. The text does not paint an optimistic picture in the discussion of an understudy. The description comes across as one of hard work, reluctant subordinates, and discouraging end results since the trainee is often transferred. Understand that all of the above are possible, but that even during the training process, the understudy will take over some of the tasks of the supervisor, allowing him to spend time on other matters.

Organizational Structure

Most of you are familiar with the departmental organization of your plant or utility. You have seen charts of its hierarchy and could construct one if required. (Remember the formal and informal lines of communication--those formal lines were often based on that organizational chart.) Organization manuals are common in all utilities and plants. You should already be quite familiar with these manuals and their information. The inclusion of job descriptions and specifications in such manuals often resolves many questions and problems before they arise.

'Informal' Organizations

The informal organization has already been noted as it relates to communication, but it also carries an overall effect. Note particularly the portion of the text which describes the informal group's selection of its leaders. These are the people often most helpful to the supervisor in the communication aspect. These are also the people who might make (or break) the best plans and objectives. With the informal groups' leaders in agreement, operation on all levels is often far easier and faster.

Meetings and Committees

Leadership comes to the fore in meetings. As the text aptly points out, meetings seem impossible to avoid in organizations. For this reason, you should learn to utilize meetings constructively.

Two types of meetings are pointed out: the informational and the discussional types. Do not expect that one type avoids information while the other avoids discussion. It is just that the overall thrust is one way or the other.

The benefits of group discussion include an exchange of ideas, mutual stimulation for more ideas, and often a contagious enthusiasm which is passed on to the less energetic members of the group.

These benefits can also work in reverse, and the supervisor should be prepared for this. If the group is such that a free exchange of ideas is not forthcoming, then even those members who have suggestions to offer will tend to hold back. Or, if the overall feeling of the group is unenthusiastic, then those who are motivated may tend to lose that motivation. The text points out the limitation of the group in that responsibility, while shared, is really held by no one person. It is up to the leader of the group to encourage the benefits of group interaction while preventing the limitations from working against him.

Effective Group Leadership

Notice the hints given in the text for effective group leadership. First, call a meeting (conference, committee) only when necessary. Second, specify the degree of authority and clarify the subject. Select appropriate participants (this includes an appropriate number, as well as persons qualified for and interested in the situation).

The Chairperson's Role

Notice that the role of a chairperson must vary with the situation and the participants. The supervisor must vary his approach between that of the general supervision method and the authoritarian one. The chairperson, however, is there to encourage the opinions of the group and should enable individuals in the group to express themselves.

Notice, too, the means at the disposal of the chairperson for achieving progress in meetings. First, there is the overall approach which is suited to the occasion and the group. Then, there is the agenda, "probably the best preventive technique for keeping a meeting from wandering off course." (text, p. 181)

Note the role of the informal organizational leader as a potential source of information to the supervisor. This is NOT to be viewed as a gossip position (where the supervisor is let in on the secrets of the employees), but as a valuable source of legitimate information that will help to keep the supervisor in tune with the employees under his control.

Leadership in Groups

The childhood days of 'follow the leader' are long gone, but the importance of leadership is impossible to outgrow. It is possible that you may not even think of yourself as an important leader at the moment, but a person certainly does not need to be the head of an industry or organization before exerting leadership impact. As a manager of others, you are a leader. This section is helping you refine those leadership skills.

Did you know that leaders are often high in certain personality traits? Which traits do you think are especially important to leaders?

1. appearance
2. intelligence
3. dexterity
4. communication skills
5. background
6. ability to assess group goals

Numbers 2, 4, and 6 are the traits which seem to be among the most important to leadership.

Conducting the Meeting or Conference

The leader who has a definite plan of attack is the one who helps to have a productive meeting. This is NOT to say that the leader who 'runs the show by holding the spotlight' is the most successful. A plan of attack may be to not provide input but to let all the group members do the talking. Meetings vary, but a general guide to conducting meetings is helpful. Here are some suggestions:

1. Presentation
    - be yourself, with YOUR style of speaking.
    - provide all information clearly, and simply. Use graphics, handouts, or other aids to get the content across accurately and efficiently.

- Do not neglect showmanship. Aim for impact (but not too much). Include humor if possible, ask questions for feedback as you go along, have EXAMPLES. Remember that questions also act as nifty 'wakeup' assets.

2. Conclusion

   - Even if the group has done the talking, make provisions for a brief verbal summary by one individual.

   - Arrange for a written, BRIEF, summary of the meeting to be produced immediately (or as soon after as possible).

   - Set a timetable, if appropriate, for a future meeting to work from the progress of the past meeting.

3. Extras

   - As leader, you should be in charge of obtaining the productivity of the ENTIRE group. (Quiet the noisy, subdue the 'constant contributor,' encqurage the silent member--if they are not to contribute, why are they there?)

   - Keep the meeting ON TARGET. This includes summary statements at appropriate intervals, probing questions for deeper thought, and paraphrasing statements as feedback to make certain the content is being understood.

   - Curtail distractions. This includes both physical (is the air conditioning on?), mental (closing the curtains on a bright, sunny afternoon), or even disrupting behavior by group members.

Problem Solving in Groups

Problem solving techniques apply to group meetings as well as to individual considerations. The group should be able to arrive at numerous alternatives, and as the text points out, the solution to the problem is only going to be as good as the alternatives suggested. The methods available for reaching and deciding upon one solution may vary, but such a solution should be reached with maximum efficiency.

A final note. As in individual problem solving, the process is not complete until a follow-up is made. Whatever form this follow-up takes, the group members should feel that their efforts accomplished something.

REVIEW

This section on organization covered a lot of ground. It goes from the basic concepts of organizing to specific organizing concerns such as leadership in groups. Part of this was to show how the basic managerial function of organization penetrates into so many aspects of the supervisor's responsibilities, from organization structure to training and authority delegation, to committee work.

As a manager of others, you are a leader.

FUTURE REFERENCE

Banker, R.F., "Coping with Increasing Costs," Journal, American Water Works Association, Vol. 67, No. 11, November 1975--Part I, pp. 600-603.

The author has selected five elements which may be highly helpful to you in an economization program. He starts at the heart of the problem--the elements of cost increase.

Corbalis, J.J., Jr., "Utility Monies Re: Federal Law," Journal, American Water Works Association, Vol 69, No. 1, January 1977, pp. 3-4.

This article provides an overview of "federal influence, including some of the rules, regulations, and assistance programs administered by the federal government as they (potentially) affect management money matters."

Davis, Keith, Human Behavior at Work, Fourth Edition, McGraw-Hill Book Company, New York, p. 197.

"The organizing process can be perceived in two ways. It may be considered as a process of construction in which a great number of small work units are built into jobs, departments, divisions, and finally a whole institution. A second approach is to view organization as a process of analysis by which a particular area of work is subdivided into divisions, departments, and finally jobs assigned to particular persons. This latter approach is more appropriate when organizing a work group because one starts with the total amount of work to be done. Viewed in this way, organizing is achieved by means of division of work and delegation."

Hetling, Leo J., Carcich, I.G., Mack, Peter J., and Klimek, John C., "Grant Aid for Plant Operations: An Evaluation," Journal, Water Pollution Control Federation, Vol. 48, No. 11, November 1976, pp. 2529-2540.

Modern facilities still require operators--and that brings us right back to the people problem. This article analyzes the use of grants in helping the operation of wastewater treatment systems.

Hollman, Kenneth W. and Boyet, Wayne E., "An Empirical Analysis of Water-Price Determinants in Small Municipalities," Journal, American Water Works Association, Vol. 67, No. 5, May 1975, pp. 274-277.

This is a summary of a study which was "undertaken to review and evaluate pricing policies of Mississippi water systems." In it, you will find certain factors described which affect prices.

Ingram, Harry E., "Revenue Collection in Cobb County," Journal, American Water Works Association, Vol. 67, No. 9, September 1975, pp. 499-500.

"The administrators of the Cobb County Water Department discovered that by initiating three management changes within their collection division, the amount in outstanding accounts could be reduced by about 25 percent." Now, how is that for a pat-on-the-back for the study of management?

Kazimer, Leonard J., Principles of Management, A Programmed Instructional Approach, Third Edition, McGraw-Hill Book Company, New York, 1974, p. 171, 195.

"The line activities in an organization are those that are directly concerned with attaining the company's product or service objectives, whereas staff activities are said to exist in order to help make line activities more effective. The authority relationships between those engaged in line activities and those engaged in staff activities, which can follow several patterns, is the major topic of this chapter. Near the end of this chapter, we also consider some of the frictions that typically develop because of the need to use functional staff experts in organizations."

"A business organization is not made up of just a set of formal authority relationships, as the formal organization chart might suggest. On the one hand, the formal position that a person holds directly influences his status as an individual and the role he strives to fulfill in the organization. In addition, the existence of an informal pattern of relationships adds a new dimension to the organization that should be understood by a manager if the forces and efforts of these groups are to be directed toward company goals instead of away from them."

Keller, Charles W., "Pricing of Water," Journal, American Water Works Association, January 1977, pp. 10-12.

Charles W. Keller has first provided a listing of the process usually used in setting utility rates. Using this as a guide, he then offers certain suggestions on revising these steps for improvement.

Laurence, Daniel C., "Cincinnati's Approach to Meter Reading and Billing," Journal, American Water Works Association, Vol. 67, No. 11, November 1975--Part I, pp. 604-606.

Meter reading, described as "for most utilities, the foundation of all utility operations," is exemplified through the practice of the timed-route plan as initiated by the Cincinnati Water Works. Would this practice benefit your utility?

Maitland, Albert J., "Water-Rate Reformulation," Journal, American Water Works Association, Vol. 67, No. 5, May 1975, pp. 262-263.

Another article on rate-setting; this example from Delaware. The water department realized in the mid-1960's that its rate policy penalized the low-volume user. Thus, a revision of its structure was instituted.

Morris, C. Robert, "Methods of Cost Control," Journal, American Water Works Association, Vol. 69, No. 9, September 1977, pp. 463-467.

The author details "five specific programs to reduce, control, and monitor costs in utility operation." How many methods have you tried?

Reiter, Glenn M., "Survey and Comparison of California Water Agencies-Rate Structures," Journal, American Water Works Association, Vol. 69, No. 7, July 1977, pp. 356-363.

"The comparison of prices among various water utilities is impossible due to the wide range of such variables as source of supply, service-area size and density, growth, energy costs and tax supports," states Reiter. He offers an analysis of these variables, illustrating why each utility "is unique."

Shields, John R., "The Effect of Inflation on Water-Utility Budgets," Journal, American Water Works Association, Vol. 69, No. 1, January 1977, pp. 5-9.

"During the past few years, inflation has required water utilities to modify their budgetary practices. It is now more important than ever to use all facets of input in preparing the budget. Information on past programs, present practices, and new changes within the utility as well as overall economic conditions in society is necessary to the development of a budget that will meet the full requirements of the utility with the establishment of clear priorities."

Sinnott, Walter B., "Scheduling Major Capital Expenditures to Minimize Costs," Journal, American Water Works Association, Vol. 67, No. 5, May 1975, pp. 271-273.

Spending money to save money? Hardly a contradiction, you will find, in this article by Walter Sinnott.

Tinsley, W.E., "Improving the Marketability of Bonds," Journal, American Water Works Association, Vol. 67, No. 5, May 1975, pp. 268-270.

Financial planning must depend upon a certain revenue. Tinsley offers some guidelines for the use, and improvement of revenue via water-utility bonds.

Williams, Theodore C., and Roberts, Eugene E., "Policies of Water-Utility Management Concerning Rate Structure," Journal, American Water Works Association, Vol. 69, No. 1, January 1977, pp. 45-46.

Have you considered the capital costs of fire protection? This is just one of the aspects considered under the rate design discussion in this article.

MINI REVIEW: SECTION 2

(not to be sent in)

There have been three chapters here--more textbook reading than in the other sections. Use this review portion for your general review before tackling the test for Lesson Four. Remember, this is for ***your*** *benefit; do not send it in.*

_____ 1. The span of supervision is:

a. that idea that a manager can effectively supervise only a certain number of subordinates, and no more.
b. the number of supervisors in an organization.
c. the average length of time required to be in the organization before making supervisor.
d. the number of levels between the lowest employee and the boss.

_____ 2. "Staff," in the text, refers to:

a. all employees of the organization.
b. all middle managers and supervisors.
c. the groups in an organization who are engaged primarily in one activity to the exclusion of all others.
d. all salaried employees.

_____ 3. Decentralization of organizations refers to:

a. nominating new supervisors.
b. looking at all positions, and possibly, redelegating authority.
c. firing all employees and hiring new ones.
d. eliminating some departments.

_____ 4. In which type of meeting does the discussion leader do most of the talking?:

a. discussional meeting
b. informational meeting
c. group meeting
d. conference

_____ 5. Usually the best preventive technique to keep a meeting on course is:

a. a good leader.
b. dedicated members.
c. an agenda.
d. formal leadership.

* * * * *

ANSWERS: 1) a 2) c 3) b 4) b 5) c

TEST FOUR INTRODUCTION

More and more of your time has undoubtedly been concerned with exploring and developing effective cost reduction programs. Adequate financial planning has become a more pressing priority. Lesson Four attempts to provide a systematic method of looking at ways to reduce costs via the Management Systems Approach. We think you will find this approach, while perhaps cumbersome in the beginning, well worth the time and thought invested.

"After getting more facts and figures, I will submit my subjective portion to my supervisor with my recommendations. As it appears, I am sure this can reduce costs at our plant." *FCD*

> *"In the case of cost reduction, I suppose all municipal managers are involved in that today. Some of the alternatives mentioned in my write up in this lesson are actually reprints of very recent activities I have been through. These lessons seem to be so timely that they coincide with the realities of my work so closely at times."* *EHH*

"When I took over as supervisor of the wastewater department, they seemed to have no preventive maintenance program or major repair plans. I could have used a course like this earlier!!!" *LDE*

> *"Budget planning and cost reduction are playing an ever-increasing role in management."* *RWS*

"This lesson was challenging! I spent considerable time figuring out the solution, but then, as always for me, I found it difficult to put it into words (but I keep on trying!)." *DLI*

> *"We have just found ourselves in a low cash flow situation and are attempting to make savings without instituting a layoff program. This lesson has helped."* *DLH*

"This lesson was very challenging--an excellent practical exercise." *PCK*

> *"Watson seems so helpful--are managers ever really that way??"* *WAH*

> *"Over half way finished!"* *DFW*

LESSON FOUR

SUPERVISORY MANAGEMENT IN THE WATER AND WASTEWATER FIELD

I. Objective Test for Lesson Four--complete this section

II. Subjective Portion of Test--
  Part I. Answer the question on the sheet provided.
  Part II. Answer the second part of the Supervisory Management Audit on Objectives, Planning and Organizing in the blanks provided.

STUDENT'S NAME______________________________

ADDRESS__________________________________

____
CITY STATE ZIP

Has your planning improved since working through this lesson? How about your organization? Get started as soon as possible on Lesson Five on Staffing.

Finished? Then just mail this to:

Self-Study Course Coordinator
432 Eppley Center
Michigan State University
East Lansing, MI 48824

OBJECTIVE ANSWER SHEET
(circle the correct answer)

1. a b c d
2. a b c d
3. a b c d
4. a b c d
5. a b c d
6. a b c d
7. a b c d
8. a b c d
9. a b c d
10. a b c d
11. a b c d
12. a b c d
13. a b c d
14. a b c d
15. a b c d

	PASSING		NOT PASSING
Objective Test Score			
Number Right	15 14	13 12 11	10 9 8 7 6 5 4 3 2 1 0
Subjective Portion			
Part I	Superior	Satisfactory	Not Satisfactory--do over
Part II	Superior	Satisfactory	Not Satisfactory--do over

Note: BOTH the Objective Test and the Subjective Portion must fall into the Passing category for you to receive credit for this lesson. If either or both parts are NOT acceptable, please rework that part to receive credit.

IF YOU HAVE ANY QUESTIONS, PLEASE DO NOT HESITATE TO WRITE IMMEDIATELY.

OBJECTIVE TEST: LESSON FOUR

(place answers on the sheet preceding these questions)

1. Unity of command means that each employee has only one immediate supervisor.

   a. True
   b. False

2. "Time is money" is an apt description of the ____________________.

   a. supervisor's time
   b. employees' time
   c. both the supervisor's time and the employees' time
   d. the boss's time

3. The type of meeting in which the chairperson does most of the talking and in which the group's questions deal generally with clarification of the subject is termed a _______________ type of meeting.

   a. discussional
   b. committee
   c. conference
   d. informational

4. The span of supervision means that there is one person in each organizational unit who has the authority to make certain decisions appropriate to the position.

   a. True
   b. False

5. Types of repeat-use or standing plans are policies, procedures, methods, and rules.

   a. True
   b. False

6. Informal work groups are beneficial for the worker because they help to satisfy the social needs, but always inhibit high productivity.

   a. True
   b. False

7. The person selected by the supervisor to be an 'understudy' may exhibit a reluctance to assume responsibility. The supervisor should ________.

   a. simply state that these responsibilities are part of the job and the person can take it—or leave it.
   b. realize this is an indication of inadequacy and select another person.
   c. do nothing, since this stage of fright will vanish shortly.
   d. carefully coach the employee and provide gradual training with lots of encouragement.

8. The job _______________ describes the human or personal qualities which are necessary to perform the job adequately.

   a. description
   b. specification
   c. recentralization
   d. organization

9. According to the text, _______________ are a supervisor's most important resource.

   a. tools and equipment
   b. work methods and processes
   c. safety and space arrangements
   d. employees

10. One example of a single-use plan is a _______________.

   a. regulating principle or directive
   b. an indication exactly how each step in to be carried out
   c. chronological sequence of definite acts which are to be performed
   d. budget

11. Departmentation refers strictly to departments, not to offices, divisions, or units.

   a. True
   b. False

12. Plans for the work loads of employees should be based on the attitude that _____.

   a. employees want to do the right thing, and work accordingly.
   b. employees shirk their duties and must be made to work faster--hence a maximum amount of time should be planned for.
   c. employees need to be pushed, hence setting a minimum amount of time is the most productive way to plan.
   d. employees will work usually more efficiently than expected, hence, plans should be made with a minimum amount of time in mind.

13. The matrix structure appears to conflict, in part, with which concept?

    a. span of supervision
    b. unity of command
    c. departmentation
    d. functional staff authority

14. Successful planning often requires the use of appropriate timing.

    a. True
    b. False

15. Primary objectives are goals established ______________.

    a. for divisions and departments
    b. for the entire organization
    c. by the middle managers
    d. by the individual employees

NAME__________________________

Lesson Four
Subjective Portion
To Be Sent In

SUBJECTIVE PORTION, PART I.

Try to contain your answer to this sheet and two additional ones at most.

PART I. Wilbur has an important task to accomplish before next week's meeting. He has stated that he will have the organization and planning work completed for the cost reduction program.

Help Wilbur out by developing the organizational approach and plan you would utilize to perform an effective cost reduction program.

The organization should include consideration of memos to be written, meetings to be held, who and what departments should be involved, etc. The plan should include consideration of schedules, man hours required to perform the program, and how to keep the cost reduction program active after the first year. Please utilize the management systems approach presented in Lesson Three, Section 1, to develop your answer to this problem.

When this part is completed, go right on to Part II, which is the Supervisory Management Audit.........

SUBJECTIVE PORTION, PART II.

NAME______________________________

SUPERVISORY MANAGEMENT AUDIT ANSWER SHEET

Place your answers to the following questions on this sheet.

D. Staffing

	YES	NO	NOT APPROPRIATE
1.			
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
12.			
13. a			
b			
c			
d			
e			
f			
g			

SUBJECTIVE PORTION, PART II.

Read over the questions as you did for Lesson Three. The answer sheet for this part is located immediately preceding these pages. Answer each question as accurately as you are able to. This is not a test. It is for your benefit—to provide you with insight into your position.

SUPERVISORY MANAGEMENT AUDIT (CONTINUED FROM LESSON THREE)

D. STAFFING

1. Have you defined the specific qualifications for employees hired for your group?
2. Do you interview, select, and hire from candidates the individual you consider most appropriate for a particular position?
3. Are all new employees assigned to specific jobs?
4. Is each new employee introduced to the specific details of his (her) job, rules, hours, etc.?
5. Do you follow up and check on each employee's performance?
6. Do you discipline your subordinates?
7. Do you discharge a subordinate if necessary?
8. Are you responsible for determining the need for employees in your department or group?
9. Do you participate in writing the job descriptions for your group?
10. Do you participate in writing the job specifications required of an employee for each job category?
11. Have you utilized the directive interview technique?
12. Have you utilized the nondirective interview technique?
13. Do you prepare for an employment selection interview by
    a. acquainting yourself with background information on each applicant?
    b. preparing a schedule or plan for the interview?
    c. selecting a proper location for the interview?
    d. trying to place the applicant at ease?
    e. generating two-way communication?
    f. attempting to eliminate your personal preferences and prejudices?
    g. being as honest as possible with each applicant about the selection decision?

Lesson Four
Evaluation Sheet
To Be Sent In

Name__________________________

EVALUATION SHEET - LESSON FOUR

Please take just another minute to complete this evaluation sheet. YOUR ANSWERS HERE WILL PROVIDE US WITH YOUR OPINION OF THIS LESSON, and are one of the prime means that we have for improving the course.

1. How accurate and appropriate did you find the case example for Section One? (Circle the best answer or write your own)

   Very realistic   So-so, at least it did not turn me off   Basically inappropriate

   Other:

2. What about Section Two?

   Very realistic   So-so, at least it did not turn me off   Basically inappropriate

   Other:

3. What part of this lesson did you find most interesting?

4. What part did you find least interesting or dislike?

5. How is the objective test going?

   Still too hard   OK   Still too easy

6. What did you think of the subjective portion in this lesson?

7. Have you encountered similar situations to those as discussed in these Sections?

   NO   YES; please describe:

8. Other comments?

We really appreciate these evaluations and comments.

LESSON FIVE

Staffing

Section 1: The Supervisor in Personnel Selection and Training
Assigned Text Reading: Chapters 12 and 13

Section 2: Supervisory Expertise in Employee Performance Appraisal
Assigned Text Reading: Chapter 14

> It is imperative that water utilities improve the quality of work aptitude of their employees by providing improved compensation and benefits if they are to improve water quality. This goal can't be met without enhancing wage, salary, and benefit incentives.
>
> Committee Report of the AWWA, "1974 Survey of Water Utilities/Salaries, Wages and Employee Benefits." Journal, AWWA, May 1975, p. 207.

LESSON FIVE—SECTION 1

THE SUPERVISOR IN PERSONNEL SELECTION AND TRAINING

"Staffing!" Wilbur exclaimed to Jack Watson. He was struggling with the problem of selecting a new head for the Engineering and Maintenance Section. He had interviewed several fine candidates, including one woman.

"That was a surprise," Wilbur admitted to Watson, "especially in THAT area. However, she had certainly appeared academically qualified, although lacking in much experience."

"Probably not her fault," Watson noted, "until lately, minorities in general have had difficulty in gaining experience--especially in managerial ranks."

"How true, how true," Wilbur concurred. "I'm just glad that times have changed now. When I think back to some earlier experiences that I've been in--where qualified individuals were not given deserved promotions, I still feel guilty. Maybe that's why I'd like to be sure to give all qualified candidates a decent chance. Did I ever tell you about one woman that I knew, way back when, named Alice Beaton?"

"No, I don't think you've ever mentioned it." Watson leaned forward. "What happened?"

"It was back when I was in the Great Plains Water District," Wilbur started. "We were looking for an office manager, and I had recommended Alice Beaton to the president. I remember that conversation virtually word for word, even now. It went something like this..."

> "How about Alice Beaton?" I had asked. "She's certainly in line for the job. Alice has had all of the requisite training and experience to become office manager."

---

* *Adapted from Training in Business and Industry, Study Number 6, August, 1972, p. 24.*

Clifford M. Guenther, president of the Great Plains Water District had rolled a ballpoint pen between his fingers and rocked slowly in his executive desk chair. "I don't know," he had said softly, "I really don't know. Give me another rundown on her experience."

I had opened the manila personnel folder and laid it on Guenther's desk. "Six years with the utility, but she had been with the Pioneer Sewer District for almost nine years before they merged with us. She started as a file clerk and worked herself up to assistant office manager at the time of the consolidation."

"We had too many chiefs as a result of that," Guenther had said. "As I recall, we had to temporarily take away her administrative assignment."

I recollected, "I recall it vividly. I was the one who took over as the assistant office manager."

"How did she take the demotion?" Guenther asked.

"No problem," I had said. "She was a good soldier."

"A good soldier," Guenther had mused, echoing his staff assistant.

"She was very capable and versatile," I had stated. "In fact, I relied on her heavily for new personnel training. Many of those green young men she trained are now managers and assistant managers," Wilbur had pointed to the personnel folder. "Alice was made assistant manager of accounting four years ago and was seriously considered for the position of manager when Mr. Fillmore retired."

Guenther had shaken his head. "Regrettably, I had a difficult choice then as well. I had to choose between a capable career woman and an equally talented young man who appeared ready to submit his resignation.

In the end I felt that accounting was not the right place for our first female manager."

"Now would be a perfect time," I had insisted, "especially in light of recent government orders on the utilization of minorities and women in business and industry."

Guenther had winced. "You need not remind me. But promotions must ultimately be based upon qualification and attitude and not on sex or color of skin."

"I agree with that completely," I had replied quickly, "but all other things being equal, why not give the edge to a woman?"

"If that were true, I just might. But all other things are not equal. Not only do I again have several capable candidates, but there have been problems with Alice lately."

"I wasn't aware of that. What's happened to Alice Beaton, the good soldier? I can't imagine her causing problems for anyone."

"That's what I'd like to know," Guenther had said. "For the past year and a half I've placed her in several assignments and all of her supervisors have complained for her deteriorating work output and poor attitudes. Several months ago we had to remove her from her role as a new employee trainer and put her on individual assignment."

"What's her complaint?"

"No one seems to be able to understand the problem. I even had her in my office once for a casual chat. I asked her to tell me what was troubling her, but she claimed there was nothing causing her any concern. I mentioned her slipping work performance and she promised she would show an improvement."

"And?"

"Oh, she's improved. I guess her work is acceptable, but that old spark is gone."

"That's a shame," I had said. "Alice Beaton has done so well . . . for a woman."

Guenther had nodded, "Yes, it is a shame. I'm afraid we'll have to look elsewhere to fill the open manager position."

"Tragic," Watson stated. "Just tragic. But it has happened so often in the past."

"Yes, and that is why I do not want it to happen here," Wilbur stated adamantly. "Not to women, other minorities, or even the employees who have been giving this utility such faithful service in any capacity. That is why I have been taking such care with this promotion. Whether we promote Hal Jones or hire in from the outside--I want that job to go to the most deserving candidate."

* * * * * * * *

Have you come across similar problems in hiring--or promoting?
How did you handle it? Read on to learn about basic staffing techniques.

THE SUPERVISOR IN PERSONNEL SELECTION AND TRAINING

With the population explosion upon us, one might be tempted to say that the one resource which we are not running out of it manpower. But all of you who have, at one point or another, attempted to find the right person for the job know that manpower is not that easily attracted or retained.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

What the Personnel Department Includes?

- The history of the Personnel Department?
- The influence of the labor unions?

The Roles Which Should be Followed?

- What the Personnel Department is supposed to do?
- How the role of the supervisor differs from that of the Personnel Department?
- How the Personnel Department can assist the supervisor, yet not take over the supervisor's responsibilities?

What is Included in the Staffing Function?

- The process of staffing?

How to Select Employees?

- The different types of interviews?
- How to prepare for an interview?
- How to conduct a satisfactory interview?
- Some of the more common pitfalls of tentative employee evaluation?
- The disadvantages of temporary job evaluation?
- The guidelines for the hiring decision?

How to Orient New Employees?

- The ways to orient a new employee to the position?

Training and Development?

- The approaches for employee training?
- What training does not stop with new employees?

THE SUPERVISOR IN PERSONNEL SELECTION AND TRAINING

Assigned Text Reading:
Chapter 12, The Supervisor's Responsibility for Staffing
Chapter 13, Selecting, Orienting and Training New Employees

The basic difference between a four part division of the managerial functions and a five part division such as in our text is usually the elimination of the term 'staffing'. The function of staffing in such a categorization is then channeled off to other areas, especially that of directing. However, when one considers the multitude of responsibilities combined under that one term, it becomes difficult to imagine the managerial functions without a special category for this special group of functions.

KEY POINTS

History of the Personnel Department

Whether or not you work in a utility system large enough to warrant having a personnel department, the history of this type of department should be of particular interest.

Roles

Each position comes with certain roles to play. The personnel department is responsible for locating potential qualified employees; the supervisor is responsible for selecting and hiring the employees needed. The middle manager MUST REALIZE THAT THE PERSONNEL DEPARTMENT MAY BE EXPERIENCED IN SELECTING CANDIDATES FOR POSITIONS - BUT THE DEPARTMENT DOES NOT HAVE THE NECESSARY EXPERIENCE ON THE JOB TO KNOW WHAT TYPE OF PERSON WOULD BE BEST FOR THE JOB. Furthermore, the authority which the supervisor relinquishes to the personnel department may be difficult to reclaim.

The Staffing Function of the Middle Manager

Notice the sequence of steps here: determine the need of what is to be accomplished; formulate a job description about that need so that the criteria for hiring applicants are available; list the job specifications so that each applicant's suitability can be readily evaluated; and determine how many employees are needed to fill the described gap. Helpful information is contained in the U. S. Environmental Protection Agency (EPA) report entitled, "Estimating Cost and Manpower Requirement for Conventional Wastewater Treatment Facilities", number 17090DAN10/71.

The manager can estimate the manpower requirements for a plant by listing the major plant operations. For example, the following lists might be used as an approach to staffing an activated sludge wastewater treatment plant:

Group I

Raw wastewater and storm water screening.
Raw wastewater and storm water pumping.
Raw wastewater and storm water chlorination.

Grit removal facilities.
Grit Disposal.

Primary Treatment.
Primary sludge and scum handling.

Operation of Blowers.
Aeration tanks and final settling tanks.
Secondary sludge return.
Secondary sludge wasting.
Chlorine feed system.
Scum and sludge removal from chlorine contact tank.

Group II

Sludge holding tank:
  Sludge transfer
  Sludge mixing
  Supernatant return

Sludge vacuum filtration.

Sludge incineration.

Ash handling and disposal

Plant housekeeping, landscaping and snow removal.

Group II, continued

Laboratory analysis.

Plant maintenance.

Plant supervision (includes preparing monthly reports, ordering chemicals, scheduling staff, reporting to City Engineer, etc.)

Group I activities are continuous. Activities listed in Group II are scheduled to be performed on weekdays. Work stations are located around the plant where the duties will be performed. Table 1 contains examples of the duties performed by the assigned personnel in order to keep the plant operating twenty-four hours per day, seven days per week.

Note that in order to cover weekends, sick time, vacations and holidays, one extra person is required for every four persons necessary for weekdays. A clerk-typist is essential.

Staff requirements must be reviewed periodically. Requirements could decrease, as the staff gains operating experience, but maintenance personnel requirements might increase as the equipment gets older. Review the maintenance records to establish whether additional personnel are required to keep the plant and its equipment operating dependably and efficiently.

TABLE - 1

PERSONNEL REQUIREMENT FOR WORK STATION

Station	Personnel	Duties
	FIRST SHIFT	
Office	One Chief Operator 1 - IA	To make rounds of the plant, assign work, take care of purchases, prepare reports
Filter-Incinerator	One Operator 1 - IIA	To coordinate and monitor sludge filtration and incineration
Filters or Aeration Gallery	One Operator 1 - IIIA	Control of sludge filtration process
Incinerator	One Operator 1 - IIIA	Control of sludge incineration
Laboratory	Two Lab Staff	To take samples and perform tests
	Two Maintenance Staff (1)	To take care of routine equipment maintenance
	Two Laborers (1)	Ash and grit disposal, housekeeping and landscaping, painting
	Sub-Total 10	

---

(1) These personnel have no fixed station

TABLE - 1 (CONT'D)

SECOND SHIFT

Station	Personnel	Duties
Filter	One Operator 1 - IIA	Monitor sludge filtration operation
Incinerator	One Operator 1 - IIA	Monitor sludge incineration operation
Aeration Gallery	One Operator 1 - IIIA	To withdraw primary and secondary sludge and to fill holding tank sludge sump.
Incinerator	One Operator 1 - IIIA	Ash disposal.
	One Operator(1) 1 - IIIA	Monitor graphic panel, make rounds of the plant, and report trouble spots.
	Sub - Total 5	

THIRD SHIFT

Filter-Incinerator	One Operator 1 - IIA	Monitor sludge filtration operation.
Filter	One Operator 1 - IIA	Monitor sludge incineration operation.
Aeration Gallery	One Operator 1 - IIIA	To withdraw primary and secondary sludge and to fill sludge holding tank and sludge sump.
Incinerator	One Operator 1 - IIIA	Ash disposal.
	One Operator 1 - IIIA	Monitor graphic panel, make rounds of the plant and report trouble spots.
	Sub - Total 5 Total 20	

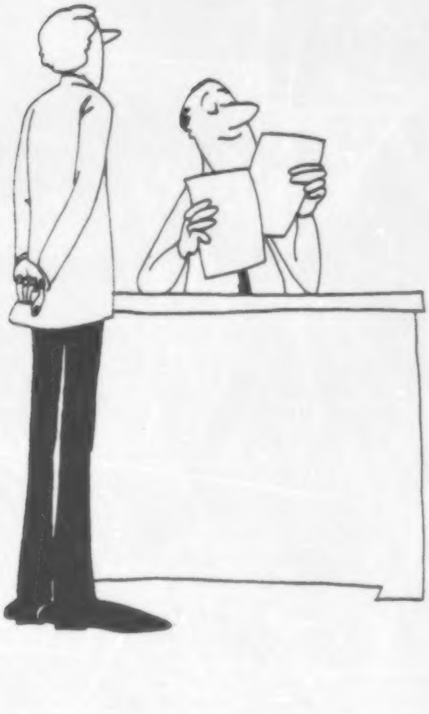
One Class IIA operator, two Class IIIA operators, and one laborer work on weekend.

Employee Selection

The basic method for evaluating the potential employee, at some stage of the hiring process, is the interview. If the supervisor is carrying out his role in this staffing function, he will be doing some of that interviewing. The majority of interviews will be directive, usually with the goal of filling a position. (Notice that the nondirective interview is used more in a counseling situation--not in a hiring situation.) The goal of both types of interviews is "to promote mutual understanding."

The Employee Selection Interview

The supervisor's preparation here is important. Know what you are going to need information-wise; get it from the candidate somehow; and then know how to interpret it afterwards. This is the supervisor's responsibility.



Preparation for the employee selection interview starts with the applicant's resume, so that the supervisor will not be starting from point zero.

The preparation starts with the applicant's resume, so that the supervisor will not be starting from point zero. Furthermore, the supervisor should evaluate the written information IN THE LIGHT OF THE JOB AT HAND.

Despite the directed form which the interview may take, it is still a two-way conversation. The supervisor should make an effort to obtain information and to relax the applicant in the process.

Interviewing can be an art. There are certain questions dealing with civil rights which may be asked, and other questions relating to civil rights which may not be asked. However, often there are ways to phrase questions which are acceptable and will still provide the necessary information in the process.

Evaluation of the applicant is also difficult for the middle manager. Note what the book has to say about some of the common generalizations: the halo effect, overgeneralization, comparison with current employees, and excessive qualifications. Try to avoid making these mistakes.

The supervisor should be aware of the opportunity in interviews to do a bit of indirect public relations work. This may be difficult if his selection process has determined that the applicant is not suitable for the position.

Yes. No.

In the final decision, the supervisor must depend upon previous experience, as well as the written and oral information gained about the applicant. The text warns against hiring an applicant temporarily, just to keep a good person around, because of the uncertainty in the future job openings.

Nondirective Interviews

You note, in the text, that interviewing approaches fall into two categories: directive, and nondirective. Often the nondirective approach is the most difficult since the supervisor's task is to draw out information without taking a too-direct approach. Some nondirective leads which may be used are:

How do you think it will work out?

What alternatives do you see?

How do you think it started?

What have you tried so far?

How do you feel about it?

What do you think of the idea?

What job areas are you interested in here?

What is your ultimate objective?

Asking for examples is often one of the best ways to obtain information:

For instance,...

Do you have an example?

Anything else?

In what way?

Encourage the person to talk about himself, especially his strong points:

You appear most interested in _____, how did your interest start?

You seem to be quite skillful in _____, how did you learn this?

If the employee appears reluctant to even answer these questions, some general questions may help:

Tell me about your (family, background, high school activities, hobbies, outside interests, etc.).

How would you summarize your experiences?

Notice, that within equal employment guidelines, some questions here may not be permitted. Be certain of what you are able (and unable) to ask.

Counseling Interviews

Counseling interviews are often difficult in that the REAL reason or problems troubling the employee are not clearly and totally brought out. Part of this may be due to the reluctance of the employee to tell the manager something which may not be desired. But, often, this inhibition is able to be overcome--IF THE SUPERVISOR IS TRULY INTERESTED IN LISTENING AND LEARNING FROM THE EMPLOYEE.

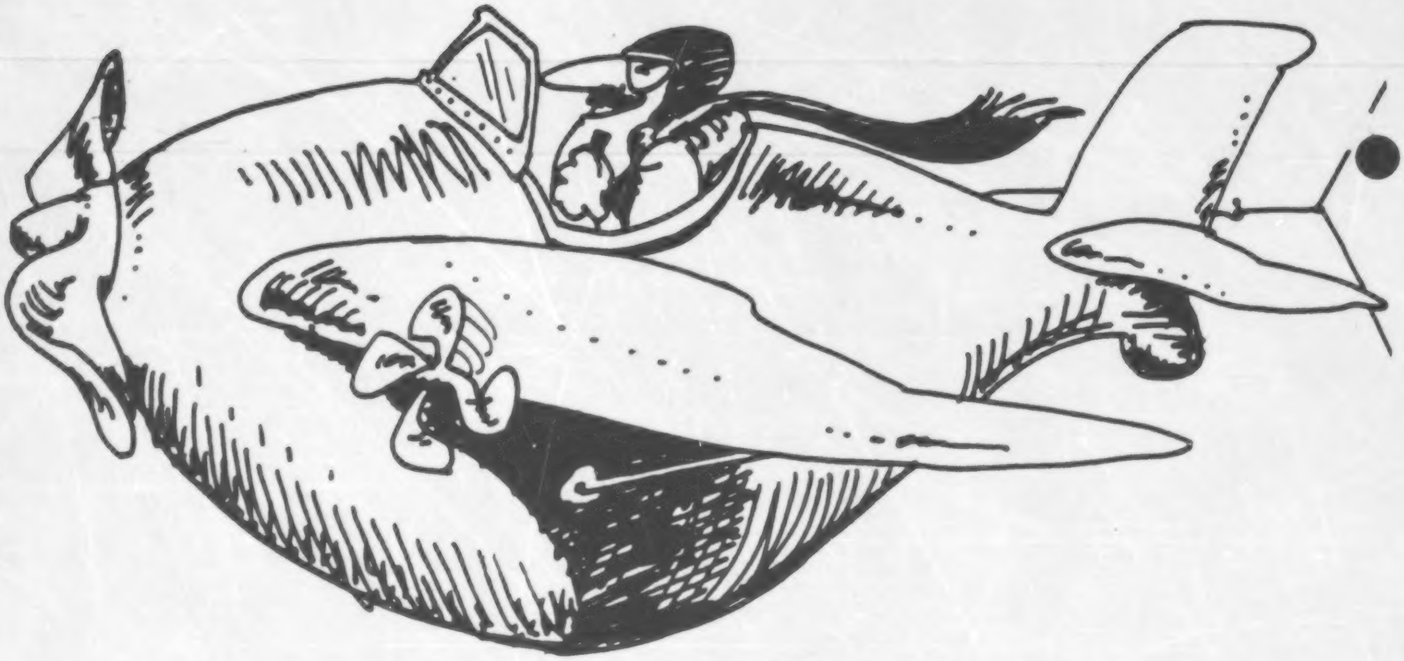
Some suggestions for the manager to follow include:

1. Put the employee at ease
   - talk around a coffee table instead of sitting sternly behind a desk;
   - offer coffee or something for the employee to concentrate upon;
   - do not have your chair far bigger, higher, or more imposing than essential--try to appear on an equal level;
   - act interested, friendly, and let the employee talk.
2. Encourage the employee to describe the situation
   - do not act judgmental (you want the FACTS);
   - try to keep emotions OUT of the conversation;
   - use different approaches to fit the specific situation;
   - use all your listening skills (full attention, both verbal and nonverbal directed at the person).
3. Aim toward a positive conclusion
   - summarize the situation;
   - do not leave the employee hanging, have either a solution, plan of action, or alternative suggestion;
   - do not hesitate to refer problems beyond your scope or ability or position;

- explore all possible alternatives, or choices;
- conclude on a positive, something has been accomplished, note.

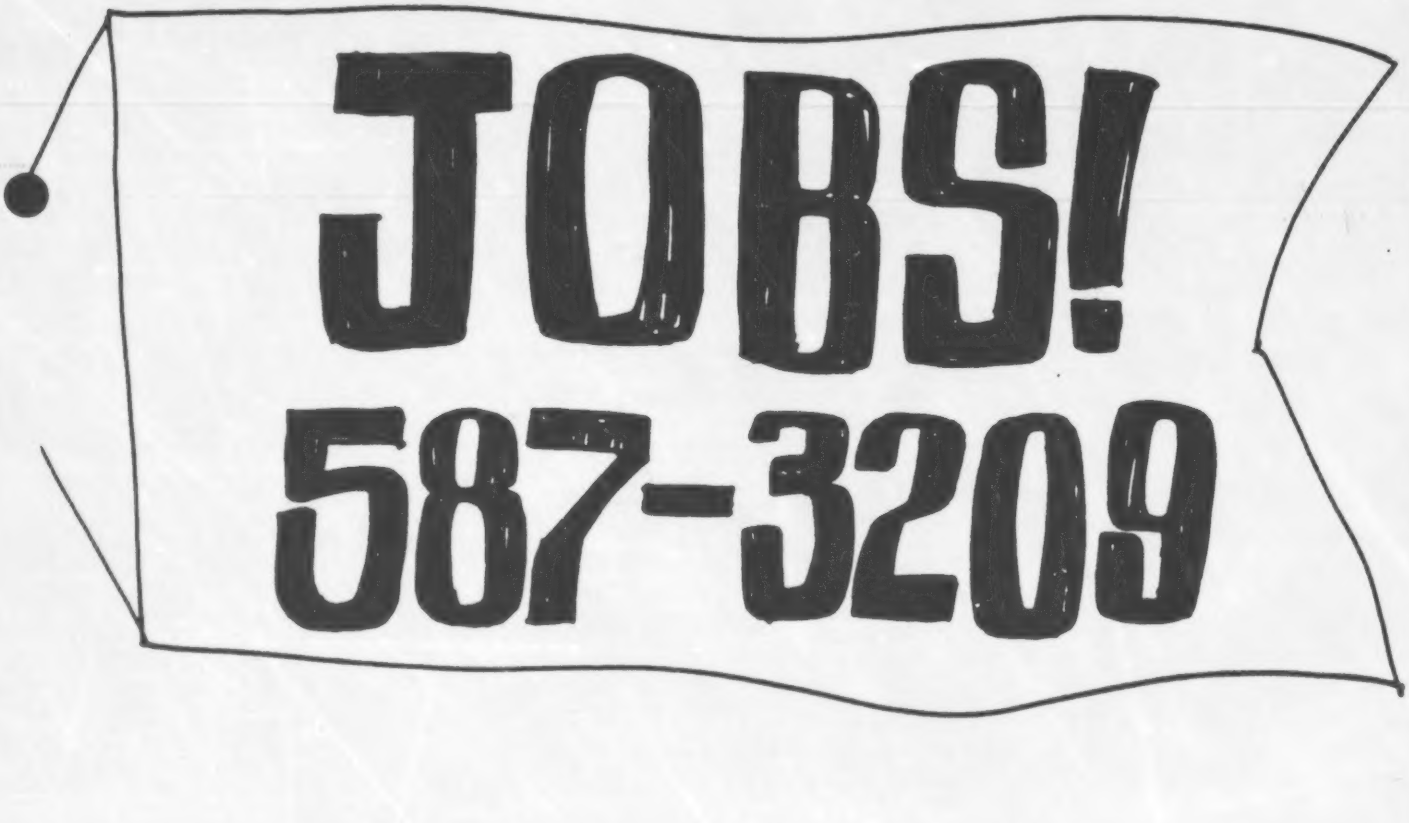
Employee Orientation

The middle manager must be aware of the new employee's anxiety during the first few days on the new job. The manager should also know that this orientation period is often the key to the new employee's rapid adjustment to the situation. The supervisor also provides for any training the new



employees may need. This does not mean that the supervisor should do the training himself (remember the delegation area), but the manager should make certain that the proper training procedures are put into effect.

A final note here. The training does not start or stop with the new employee; the supervisor should also be continually seeking out training experiences. You are to be congratulated here. By participating in this course, you are carrying out this portion of the supervisor's responsibility.



The personnel department must inform the community concerning what jobs are available and participate in developing a favorable image of the organization as an employer.

REVIEW

This first section of Lesson Five has approached the supervisor's tasks as to staffing and dealing with employees on a personal interview basis. Selection of the most appropriate employees requires the supervisor to have skill, knowledge, and the ability to communicate aptly with others. Hiring today also demands that the manager be familiar with the rules and regulations surrounding equal employment hiring practices.

The interview is a prime vehicle for communication with employees. The supervisor who is able to utilize interviews to obtain desired information and also improve relations with and between employees will find his or her tasks far easier and often enlightening.

FUTURE REFERENCE

Binney, Mel C. & Regadanz, Bruce E., "Proper Strategies for Upgrading Employee Performance," *Journal*, American Water Works Association, January 1973, pp. 50-56.

Burke, George W. Jr., "Estimating Personnel Needs for Wastewater Treatment Plants," *Journal*, Water Pollution Control Federation, Vol. 48, No. 2, February 1976, pp. 241-255.

Casteel, Stephen C., "Training Can Be Successful," *Water and Sewage Works*, October 1971, pp. 332-334.

This includes a few, good, basic ideas--some of these ideas and suggestions seem pretty simple. *But* how often do we forget the simple ones?

Coleman, James L., Jr. and Greene, William L., "Recruiting Professionals in a Dynamic Environment," *Journal*, American Water Works Association, December 1970, pp. 765-768.

This article discusses just that--recruiting.

Dyer, Garvin H. and Becker, Elmer W., "Recruiting and Holding Good Employees: Employee Grievance Procedures," *Journal*, American Water Works Association, August 1970. pp. 465-467.

This article, which also contains the word 'recruiting' in the title, is written by Dyer and stresses *keeping* as well as *finding* workers.

Longino, C. F., Jr., Green, C. S., III, Kauffman, C. F., "Sewage Treatment or Pollution Control--Trainees View Their Jobs," *Journal WCPF*, January 1972. pp. 41-46.

This article on the EPA wastewater treatment plant operators and their opinions and views of themselves and their work is interesting. As middle managers, you may or may not know some of these views. Read on.

MINI REVIEW: SECTION 1

This lesson has not been as long as the previous lessons. However, if you have been involved with any staffing situations, you know how important this area is. Complete this review to see if you have familiarized yourself with the material. Then go right on to Section 2. Do not send this Mini-Review in. As usual, the answers are at the bottom of the page.

_____ 1. Personnel departments historically were started as:

a. budget departments.
b. personnel departments.
c. sales departments.
d. record-keeping departments.

_____ 2. Today, the function of personnel departments is to:

a. act as controllers of the staff of the organization.
b. hire and fire.
c. advise and counsel the line supervisors.
d. advise and counsel all employees, regardless of position.

_____ 3. It is better for the supervisor to be unfamiliar with the applicant in advance of the interview so as to be free from bias.

a. True
b. False

_____ 4. The supervisor tends to see qualifications over that required for the job. This is the pitfall of:

a. the halo effect.
b. overgeneralization.
c. current employee comparison.
d. excessive qualifications.

_____ 5. Temporary job offers are a desirable way of catching good employees until something suitable for their skills opens up.

a. True
b. False

ANSWERS: 1) d 2) c 3) b 4) d 5) b

LESSON FIVE - SECTION 2

SUPERVISORY EXPERTISE IN EMPLOYEE PERFORMANCE APPRAISAL*

Wilbur and Jack Watson were still continuing their conversation on hiring and promotion practices. Watson was beginning to feel that he would never find a replacement so Wilbur would be able to return to his own position.

"I don't know, Wilbur," Watson commented, "seems as if your experiences with hiring have been a problem of too many applicants—now I have the reverse problem of not being able to find anyone."

"That is true—good employees are hard to find!" Wilbur was the first to agree. "I would not be able to sleep at all, handling this job without the feeling that the folks back at Deephaven are able to cope with anything that comes along."

"You know, Wilbur, there is one thing about your utility over there that has puzzled me for awhile. Deephaven is really fortunate to have you, but I've always been a bit surprised that they went outside when they had some fellows handy who would appear to be most competent right there. For instance, why wasn't Harry Deering promoted to the job of manager? Deering always seemed to be a highly capable guy."

"Funny you should mention that, Jack," Wilbur looked over at him with amazement. "That very question bothered me from the day I interviewed for the job of manager at the Stanhill Sanitary District. Several times during the interview the employment manager even mentioned the District policy of promotion from within whenever possible. I asked why, if that was the usual policy, they were going outside the utility to fill the job. I was told that, because of recent staff turnover, no one in the entire department was adequately prepared to assume leadership of the group.

---

*Adapted with permission from Training in Business and Industry, August 1972, p. 28.

But within three months I knew why they had not promoted from within. The top choice, Harry Deering, would probably never be able to assume the job of manager. But that was a secondary issue. What really concerned me was Harry Deering's problem. Whatever it was, he would not talk about it. All I could see were the symptoms, which, in turn, were causing problems for me.

Harry Deering came to work late every day. Yes, I said, *every* day! Sometimes it was only fifteen or twenty minutes, but often it was more like three quarters of an hour. He also took long lunches and *never* stayed overtime.

Being new, and with no prior supervisor to lean on for background information, I waited a couple of weeks before saying anything to him. Then, in a very casual, light-hearted way, I kidded him about his punctuality. He was composed, but his eyes indicated he was upset at my inquiry. Instead of responding to my friendly barbs, he changed the subject!

I'm not a clock watcher. My concern is for total productivity, not the hours a person spends on the job. I recognize that you have to be flexible in managing office and administrative operations. But Deering was *always* late and, although no one else said anything to me, I could tell it was troubling the others in the department.

So one day I decided to simply ask Deering directly why he was continually late, thinking perhaps he might be having transportation difficulties. Again he stiffened when I brought up the subject of his tardiness.

"I don't have a transportation problem or any other problem," Deering had said.

"Then why are you late every day?" I had asked bluntly.

"I am a professional," he had replied. "I am paid for the work I do and not the hours I keep."

"What about the others?" I had asked. "Don't you suppose they are concerned?"

"They are clerks and must work by the clock," Deering had replied. "I am a professional and am paid for the work I accomplish."

Deering was both right and wrong. We had several clerks and they were hourly. However, the two assistant managers were both exempt personnel, yet maintained regular working hours.

Now if Deering had been a marginal worker, I might have a good case for disciplinary action. To the contrary, his productivity was above average and steady. He tended to avoid office chit-chat and, although never rude, spent most of each day involved in his paperwork or on the phone with suppliers. He left the office each noon and, as far as I could tell, dined alone.

Although it's generally a poor practice, I talked to two or three of the others to determine what they knew of Deering. I found little. He had been in the department three years and had always been late. No one knew why the prior supervisor had done nothing to correct the problem. His personnel folder gave his age as 47 and showed that he had been married several years and had one child. There was no record of tardiness noted or any disciplinary actions.

After that I began to suspect a medical problem might be involved. I had asked Deering to join me and several others for pizza one lunchtime. As usual, he declined politely. But he did mention a difficulty he had with certain foods, often resulting in loss of sleep.

In my last effort to help Deering I had asked if he had seen a doctor.

"No," he had replied. "I have not."

"Don't you think it might be a good idea?" I had offered.

"I think that is my business," he had replied crisply.

What do you do with a guy who refused to acknowledge a problem he had been creating for me? If there was a reason other than his stubborn professionalism for being late, he didn't want to let me in on it. I did not have any reason to believe he was an alcoholic, but something had been wrong. If I could only have gotten him to talk about it.

"Well!" Watson exclaimed. "What happened?"

Wilbur looked depressed. "Harry retired last year. Moved to Arizona, I believe. No one ever hears from him, to my knowledge. I never did figure that one out."

"See," Wilbur managed a slight grin at Watson, "Deephaven is hardly a heaven—it has its own share of problems."

* * * * * * * *

Ever run across a 'silent' employee? Or one who was persistently tardy? Or one who had an alcohol problem? Matrimonial problem? If you have NOT, you are in a great minority yourself. You cannot afford to ignore all personal problems of your employees since some of those problems are bound to spill over into their job performance. And, employee performance and appraisal ARE your concern. Read on to see what the text and manual have to say on this aspect of being a manager.

SUPERVISORY EXPERTISE IN EMPLOYEE PERFORMANCE APPRAISAL

This section appears to cover a great deal of ground in short order--moving from appraisal to compensation. But these often follow hard one upon another. Compensation based upon a superior appraisal is often used as a motivator--but to be an accurate reward, that appraisal should be correct. How is your employee performance appraisal going?

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

How to Appraise Employees?

- The methods of appraisal?
- The desired format and context for appraisal performance forms?
- Some of the difficulties encountered by appraisal forms?

How to Conduct Evaluation Interviews?

- The additional interviewing skills required for the evaluation interview?

Promotion?

- What is meant by 'promotion policy'?
- The criteria for the promotion concept?

Compensation:

- What is meant by internal and external alignment?
- Job evaluation techniques?
- What is meant by a wage and salary survey?
- The supervisor's role in the area of compensation?

SUPERVISORY EXPERTISE IN EMPLOYEE PERFORMANCE APPRAISAL

Assigned Text Reading:

Chapter 14, Appraisal, Promotion, and Compensation

A paradox seems to exist. Employees, on the whole, desire periodic evaluations of their performance. But many managers and supervisors tend to ignore such appraisals, or at best, do only a perfunctory job of appraising their employees. Why? Part of the reason is that appraisal; careful, accurate appraisal, is a difficult task. Often, employees are evaluated on the basis of certain performance which is more qualitative than quantitative in nature. Evaluating this type of performance is not easy. But it should be done. Read on to gain some insight into improving your employee appraisals.

KEY POINTS

Employee Appraisal

Many of the responsibilities of the supervisor are presented in a positive manner in the text when, in the real world, these tasks are not taken in such an optimistic manner. Employee evaluation is probably one of these areas. You have probably noticed that the text seems to have a common remedy for these situations, i.e., think positively and make the most of the task at hand. Approach employee appraisal in this way. Use the appraisal situation constructively so the employee and the entire department benefit as a result.

Communication is important throughout the appraisal in WHAT is communicated. If the information is too vague ('poor motivation?' 'inadequate aptitude?') or too emotionally-charged (discussing salary at the same time as performance may well be nerve-racking), communication may suffer.

Like most other forms of communication, timing plays an important role in appraisal. Appraisals may be conducted too often (not enough constructive feedback to provide an adequate basis for judgment) or too infrequently (the good has been long forgotten and only yesterday's mistakes are remembered.) As well, appraisals which are not formally scheduled may strike panic into employees who believe they are about to be reprimanded.

Appraisal forms are often inadequate. Usually the information listed on the forms really is not a TRUE judge of the quality of the employee's work. As well, choices or alternatives are often too limited. (The employee's work was "superior, adequate, below par?" In reality, it was most satisfactory, but just not quite superior--and this employee has been judged only adequate.)

Methods of Appraisal

Employee appraisal ranges beyond the strict approach of the supervisor using a personal checklist to evaluate the performance of subordinates. The supervisor has a number of general evaluation aids at his or her disposal. These include the general situation in the utility--such as absenteeism, turnover, the number of accidents or other indications of discontent such as grievances. Even the amount of the budget which goes for supplies, equipment and the breakage record are part of employee evaluation.

The manager is also able to obtain the opinions of others in evaluation through the use of group conferences, attitude surveys, and suggestion boxes. A variety of appraisal forms are available if the current one does not appear satisfactory.

Generally, formal appraisal forms of some sort are used. However, the supervisor should be aware of the shortcomings of rating many employees by using the same form. The employees will differ, often their tasks on the job differ, and supervisors themselves differ.

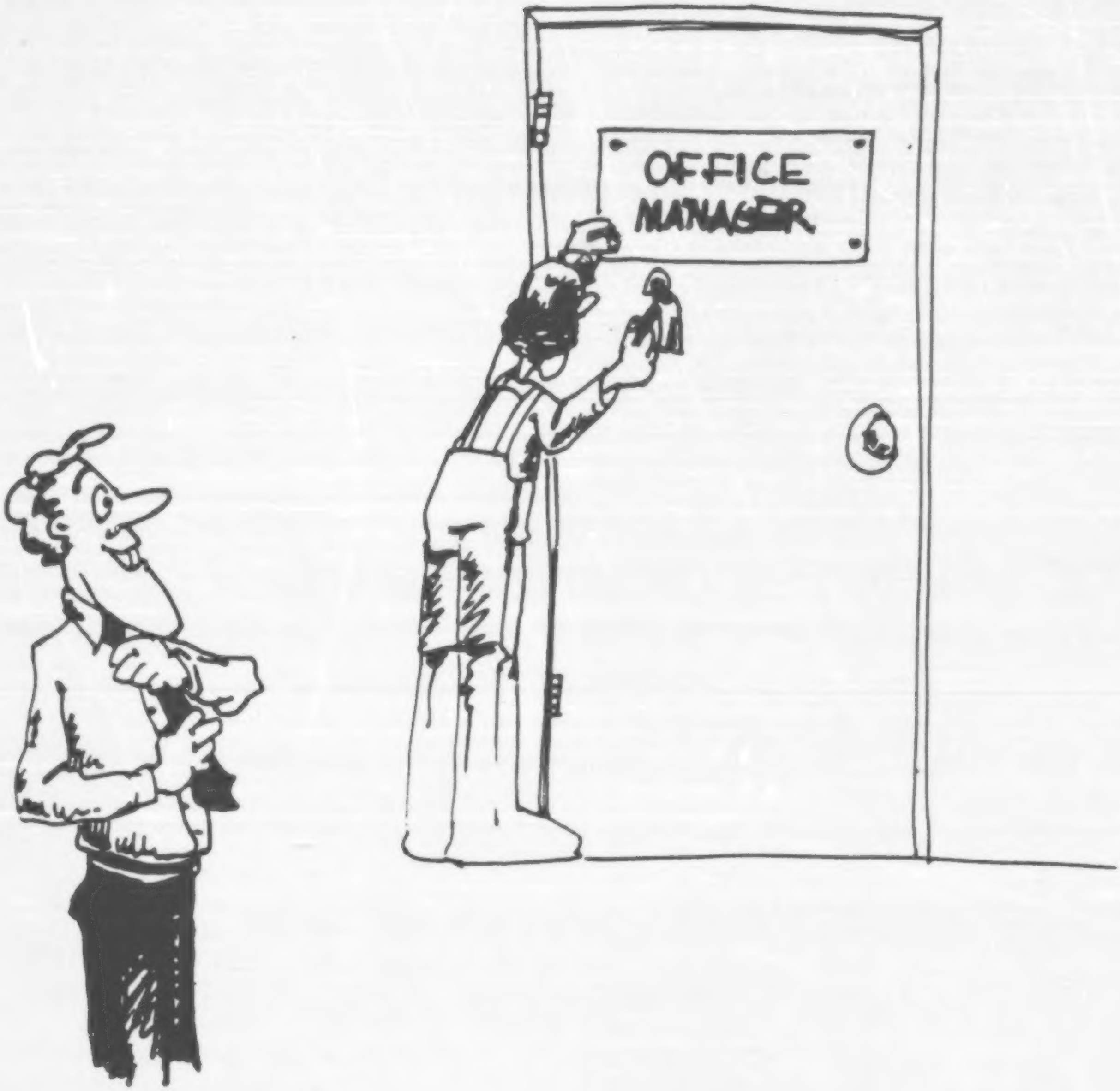
The Evaluation Interview

In addition to rating the employees, the appraisals must be discussed with them. This type of interview is probably less pleasant for the supervisor if the verdict on the employee is not good. Indeed, even the best employees should have room for improvement. So, the middle manager is again caught in the middle. While the employee probably may receive constructive criticism, he would rather be praised for a good job.

The supervisor should follow the proper procedure in preparing for the interview. Note the text's suggested technique of having the employee fill out one of the rating forms himself. This can provide information to compare with the supervisor's views. The supervisor should guard against the potential hostility in this type of interview by maintaining good communication with the employee throughout the interview.

Performance Discrepancy

Here you are, a supervisor who has determined that Joe (or Janet or Steve...) has not been working up to par. What now? It might be helpful to run through an analysis to help you come to some conclusions on WHY their performance is below expectations.



The majority of workers tend to strive more and work better if there is a visible promotion possibility open to them.

First, ask yourself if there REALLY is a performance problem.

a. Maybe not. Perhaps you just expected way over and above because Joe (or Janet or Steve...) is a highly capable employee. They might be meeting that job description and not even realize you expected so much more.

-or-

b. Yes, there is. Performance is definitely below expectations.

Second, ask yourself if this is due to training or performance.

a. Might be training. Perhaps Joe (or Janet or Steve...) does not really KNOW how to accomplish that job. Have you determined that they really know HOW to do it? If not, then this is where you start. (They may not even know WHAT exactly the task involves).

-or-

b. No, it is not a training problem--you have determined that much. So, if they know what to do, and how to do it, then, your next tasks is to figure out WHY they are not doing it.

Third, ask yourself what reasons might be underlying this problem.

a. Are all tools, equipment, and accompanying needs being met? (Can't expect them to come through if those vital tools are not there. Remember, time is also a resource, too).

b. What rewards are being offered for the completed job? (Doesn't have to be monetary, but could easily meet those higher needs of esteem or self-fulfillment). Perhaps you are rewarding that LACK of completion (do you notice only the laggards, and forget to compliment the completed ones?).

c. Does the employee see the reason for the job? Does this reason help the utility? The employee? (Preferably both?)

Fourth, what is to be done about the situation?

a. If any aspects, based on the above questions, are lacking then you know where to start. If none of the above aspects appear to lead to the problem, then perhaps the employee has some personal problem interfering with their work.

b. Point out their options:

1. Overcome that obstacle to their work and accomplish the tasks successfully.
2. Transfer or move into another job area more suitable to them.
3. Terminate.

Obviously, these last two options represent a loss for the supervisor. They mean a loss of a potentially good employee and a number of hourse of training and experience being lost. Overcoming that obstacle is usually preferable.

Ah, Success

Successful employee appraisals are possible. Some hints toward better appraisals may be built from the information in this section:

1. Time that appraisal appropriately (not too soon, or late, or often).
2. Base evaluation on employee's performance on the job.
3. Discuss performance more often than just at the appraisal, (especially true of negative performance—catch that AS SOON AS POSSIBLE, do not wait until the year has passed for mistakes to be noted).
4. Record incidents throughout the time to be used as examples; be CERTAIN to note numerous positive examples.
5. Balance the good with the bad (leave HOPE!).
6. Mutually set future performance goals (that way, both the supervisor and the employee know what is expected).
7. Encourage feedback from the employee, and provide it yourself, so the employee knows what is happening all along (no surprise is the best surprise, runs one motto).

Promotion

The majority of workers tend to strive more and work better if there is a visible promotion possibility open to them. Furthermore, as the text points out, far more information is usually known about current employees than an outside individual being interviewed for the job. The supervisor will have a variety of points upon which to evaluate the employee for a promotion, but the deciding factor will often be based on the supervisor's experience and background in such situations.

Compensation

In the section on motivation, it was pointed out that financial motivations are often out of the control of the middle manager. As far as possible, however, it is the duty of the supervisor to obtain adequate and fair compensation for his employees.

Up to this point, the discussion has centered on employee evaluation, but a job evaluation also exists. The supervisor should examine the position and the wages paid, to determine if there is adequate pay for the work being performed. As the text points out, there is little that can lower employee morale faster than an unequal internal wage alignment.

* * * * * * * *

REVIEW

This lesson has concerned the aspects of staffing in relation to evaluation sessions, and promotion considerations. Much of the information in this lesson is probably academic knowledge at the moment. It is only when the middle manager starts putting some of these concepts into practice that the results will start to show.

FUTURE REFERENCE

Davis, Keith, Human Behavior at Work, Fourth Edition, McGraw Hill Book Company, New York, 1972.

Dyer, Garvin, "1974 Survey of Water Utilities Salaries, Wages, and Employee Benefits," Journal, American Water Works Association, Vol. 67, No. 5, May 1975, pp. 209-214.

Erickson, Claud R., "Better Salaries for Better Employees, " Journal, American Water Works Association, January 1973, pp. 44-47.

This article provides a description of the reasoning responsible for the salary program that was designed by the Lansing Board of Water and Light in 1969.

Kazimer, Leonard J., Principles of Management, A Programmed-Instructional Approach, New York, McGraw Hill Book Company, 1974, pp. 228-261.

"Our attention to the human element is incomplete, however, if some attention is not given to the process and methods by which people are selected for participation in the organization, how their performance is appraised, and the methods which can be used to develop higher-level skills. Indeed, some authors consider this process so important to managerial effectiveness that they classify 'staffing' as a separate function of management, in addition to planning, organizing, directing and controlling."

Sims, Daniel A., "Employee Benefit Trends," Journal, American Water Works Association, April 1972, pp. 207-210.

This article deals with keeping your employees--and points out that, like virtually everything else these days, employee benefit costs are RISING. You may not help those costs stay down, but you will know what you are in for.

Voegtle, John A., "Career Development Guide for Wastewater Facility Personnel," Deeds and Data, 1973.

This involves the concept of a Career Development Guide.

Voegtle, John A. and Vilen, Frank I., "A New Concept for Operator Wages," Journal WPCF, February 1973, pp. 203-209.

This article discusses a new system of payment--and how that payment can be more fairly determined. A good wage scale (good referring to both the size and idstribution of payment) is a powerful magnet in attracting quality employees.

MINI REVIEW: SECTION 2

Ready for a self-appraisal on your knowledge of this section? Try this Mini Review. If you find you are familiar with the material, turn to the test section for this lesson. Remember, the answers are at the bottom of the page and you do not send this in for correction.

_____ 1. Appraisal of employees is a task of the supervisor which occurs _____ occurs_______________.

a. once a year
b. once every six months
c. only the first six months
d. on a day to day basis

_____ 2. The second basic step in an appraisal is

a. the evaluation form
b. the drawing up of the job description
c. the appraisal interview
d. the annual promotion or wage increase

_____ 3. A supervisor should point out the possibility of promotion as a motivator, even if such a promotion is slight.

a. True
b. False

_____ 4. It is a well-known fact that every employee wants to be promoted, according to the text.

a. True
b. False

_____ 5. Most union contracts include provisions for promotion based on:

a. age or minority status
b. seniority or length of service
c. seniority plus merit and ability
d. merit and ability

* * * * * * * *

ANSWERS: 1) D 2) C 3) B 4) B 5) C

TEST FIVE INTRODUCTION

Up to now, you have applied the Management Systems Approach to technically-oriented problems, i.e., motivating, communicating, and organizing to get problems solved and work accomplished. Lesson Five deals solely with "people" problems--namely selecting and then appraising employees. In the test portion that is coming up, you will be learning to use the Management Systems Approach to solve these people problems. Below are some comments from students who have completed Lesson Five.

"The repetition of the Management Systems Approach is helping me solve my own problems more easily by using the system in different situations." DEW

"The whole lesson is a good indication to me what our upper management is doing wrong." RB

"This lesson is a confirmation to me on the importance of people." SP

"We had an employee who was assigned to a two man crew and he was having all kinds of problems (drinking, personal, everything you could think of). We had him for several interviews and then made the decision to take him out of the crew and put him to work by himself to let him sink or swim, as the case may be. It was the best thing that we could have done for him. He is now one of my best employees. He apparently was not getting enough responsibility in the crew and needed more." RHS

"This lesson is a must for all leaders and is described well." EF

"One thing this course has made me realize--I wasn't really doing any creative thinking. I am pleasantly surprised how this course has awakened me to creative reasoning again. Thank you." WR

"I have always been dedicated and motivated. I use my motivation to assure others who may tend to hold themselves back to realize that they can rely on me. They become knowledgeable and the younger men gain the confidence and the incentive to advance to higher positions." RFW

"The understanding of human needs was the most interesting part of this lesson." JC

"Onward, ever onward!" DMW

Lesson Five
Answer Sheet
To Be Sent In

NAME ______________________

LESSON FIVE

SUPERVISORY MANAGEMENT IN THE WATER AND WASTEWATER FIELD

I. Objective Test for Lesson Five--complete this section

II. Subjective Portion of Test
Part I. Answer the question on the sheet provided.

Part II. Answer the following questions from the Supervisory Management Audit on the answer sheet provided.

STUDENT'S NAME ______________________

ADDRESS ______________________

____
CITY STATE ZIP

This will be returned very shortly to you with your grade, but don't wait to get started on the next lesson. You will have to direct yourself to continue.

Finished? Then just mail this to:

Self-Study Course Coordinator
432 Eppley Center
Michigan State University
East Lansing, MI 48824

OBJECTIVE ANSWER SHEET
(circle the correct answer)

1. a b c d
2. a b c d
3. a b c d
4. a b c d
5. a b c d
6. a b c d
7. a b c d
8. a b c d
9. a b c d
10. a b c d
11. a b c d
12. a b c d
13. a b c d
14. a b c d
15. a b c d

	PASSING		NOT PASSING
Objective Test Score			
Number Right	15 14	13 12 11	10 9 8 7 6 5 4 3 2 1 0
Subjective Portion			
Part I.	Superior	Satisfactory	Not Satisfactory
Part II.	Superior	Satisfactory	Not Satisfactory

Note: BOTH the Objective Test and the Subjective Portion must fall into the Passing category for you to receive credit for this lesson. If either or both parts are NOT acceptable, please rework that part to receive credit.
IF YOU HAVE ANY QUESTIONS, PLEASE DO NOT HESITATE TO WRITE IMMEDIATELY.

OBJECTIVE TEST: LESSON FIVE

(place answers on the sheet preceding these questions)

1. One problem with employee appraisals is that the language used is often too vague.

   a. True
   b. False

2. Because wages and salaries are usually beyond the control of the middle manager or supervisor, this is one aspect where the supervisor should maintain a 'hands off' policy of noninvolvement.

   a. True
   b. False

3. The supervisor should not review the applicant's background until after the interview so erroneous impressions will not be carried on from a past, disagreeable experience in the applicant's background.

   a. True
   b. False

4. A question such as "What do you feel about this idea?" would typically be used in what type of interview?

   a. directive
   b. nondirective
   c. employment
   d. appraisal

5. Fringe benefits cost the employer about ______ percent over wages and salaries.

   a. 10
   b. 20
   c. 30
   d. 40

6. The majority of employees have indicated that they desire a formal appraisal of their work performance.

   a. True
   b. False

7. Appropriate wage schedules are determined through ______________.

   a. high management
   b. employee surveys
   c. job evaluations
   d. supervisor decision-making powers

8. One of the 'pitfalls' in applicant evaluation which takes an aspect which is apparent during the interview and expands that to include ways in which the employee will act on the job, is that of ______________.

   a. the halo effect
   b. overgeneralization
   c. comparison with current employees
   d. excessive qualifications

9. A written statement of required knowledge, skills, and attributes is termed a job ______________.

   a. description
   b. specification
   c. evaluation
   d. interview

10. The first task of the supervisor in the actual interview with the employee is to______________.

   a. collect all pertinent data about the interviewee
   b. put the person at ease
   c. make a powerful impression upon the interviewee
   d. make certain the employee understands the job being filled

11. Temporary placement of a qualified employee for whom no job is currently available for their particular skills is considered__________________.

   a. wise, since the manager maintains a group of capable employees to draw from when openings occur.
   b. unwise, since the person often becomes discouraged and disillusioned.
   c. sensible, since the organization then gains the loyalty of the employee over a longer period of time.
   d. the only course of action since that employee may be hired by a competing organization otherwise.

12. Salaries within an organization or utility are not equally distributed. This is termed poor ______________.

    a. job specification
    b. internal wage alignment
    c. job description
    d. internal employee evaluation

13. When the interviewer knows in advance what facts will be discussed in the interview, it is termed a ______________ interview.

    a. counseling
    b. nondirective
    c. directive
    d. performance

14. Another term often used for the performance appraisal is merit rating.

    a. True
    b. False

15. The employment interview should be __________________.

    a. one-sided, with the supervisor doing the questioning.
    b. one-sided, with the applicant doing the questioning.
    c. two-sided, with both asking questions relating to the applicant and the job.
    d. two-sided, in that the supervisor describes the job and questions the applicant.

NAME____________________________

SUBJECTIVE PORTION, PART I.

PART I. Wilbur never did solve the problem of the employee, Harry Deering, back at the Deephaven utility. Analyze the situation concerning Harry. Use the Management Systems Approach, as you have on prior lessons. Conclude with recommendations on what Wilbur should have done about the Harry Deering situation.

Use the remainder of this sheet and additional pages if needed.

When you have completed Part I, go right on to Part II, which is another portion of the Supervisory Management Audit.

SUBJECTIVE PORTION, PART II.

NAME________________________

Lesson Five
Subjective Portion
To Be Sent In

SUPERVISORY MANAGEMENT AUDIT ANSWER SHEET

Place your answers to the following questions on this sheet.

E. Directing

	YES	NO	NOT APPROPRIATE
1.			
2. a			
b			
c			
d			
e			
3.			
4.			
5.			
6.			
7.			
8.			
9. a			
b			
10.			
11.			
12. a			
b			
13.			
14.			
15.			
16.			
17.			
18. a			
b			
c			
d			
e			
f			
19.			
20.			

F. Controlling

1.			
2.			
3.			
4.			
5a.			
6.			
7.			
8.			

SUBJECTIVE PORTION, PART II (CONTINUED)
Audit, Continued

E. DIRECTING

1. Do all directives or orders come only from you as the supervisor?

2. Are all of your directives

    a. reasonable in terms of being able to accomplish the task?

    b. understood by the subordinate?

    c. issued in appropriate tone and words to stimulate willing and enthusiastic acceptance?

    d. compatible (consistent) with the purposes and objectives of the organization?

    e. specific with regard to the time limit to complete the task?

3. Do you generally choose autocratic, close supervision giving direct, clear, and precise orders to subordinates with detailed instructions?

4. Do you generally consult with the employee concerning a problem before making a decision and issuing a directive?

5. Do you allow the employee to work out the details of an assigned task?

6. Are the reasons behind your directives explained to your subordinates?

7. Do you help your subordinates understand the need and impact of change before the change is implemented?

8. Do subordinates share in the decisions involved in implementing change?

9. Are you alert to the factors influencing morale:

    a. external (sickness in the family, hobbies, etc.)?

    b. internal (job security, appreciation for a job well done)?

10. Are your subordinates reminded of how significantly they contribute to overall objectives?

11. Do you generally act toward your employees as a leader who has the situation well in hand and can rely upon employees to help correct the situation if something goes wrong?

12. Do you attempt to measure morale through:

    a. observation (levels of productive efficiency, tardiness and absenteeism, accident and safety records, etc.)?

    b. morale and attitude surveys?

AUDIT (CONTINUED)

13. Are new rules introduced with an explanation to subordinates as to what is expected of them and why the rules are needed?

14. Do you follow the rules that you expect subordinates are to observe?

15. Is your disciplinary action taken with sensitivity and sound judgment?

16. Is a thorough investigation conducted before taking disciplinary action?

17. Is disciplinary action taken in private with the employee involved?

18. Do you in general utilize the idea of progressive disciplinary action as follows:

    a. informal talk

    b. oral warning or reprimand

    c. written or official warning

    d. disciplinary layoff

    e. demotion

    f. discharge

19. In taking disciplinary action, do you follow the "hot stove rule", attempting to begin the disciplinary process as soon as you notice the violation, warn subordinates in advance of the consequences of violations, applying discipline consistently and impersonally?

20. Does each subordinate have the right to appeal disciplinary action?

F. CONTROLLING

1. Are controls available to assist in correcting deviations from established standards as soon as possible so as to minimize the time lag between results and corrective action?

2. Do you have enough familiarity with the jobs of your subordinates to determine which jobs should be observed daily, weekly, monthly, etc.?

3. Are the controls that are utilized economical and adequate for the jobs under your responsibility?

4. Are the controls utilized flexible to adjustment if warranted?

AUDIT (CONTINUED)

5. Do you follow the three basic steps essential for control?

   a. set standards for measuring performance?

   b. checking on performance versus standards or goals?

   c. take corrective action for variations from standards?

6. Is a budget used in your control process?

7. Do you participate in making the budget for your group?

8. Is there some flexibility in the budget through regular budget reviews?

NAME ______________________________

Lesson Five
Evaluation Sheet
To Be Sent In

EVALUATION SHEET - LESSON FIVE

Please take just another minute to complete this evaluation sheet. YOUR ANSWERS WILL PROVIDE US WITH YOUR OPINION OF THIS LESSON, and are one of the prime means that we have for improving the course.

1. How accurate and appropriate did you find the case example for Section One? (Circle the best answer or write your own)

   Very realistic   So-so, at least it did not turn me off   Basically inappropriate

   Other:

2. What about Section Two?

   Very realistic   So-so, at least it did not turn me off   Basically inappropriate

   Other:

3. What part did you find most interesting?

4. What part did you find least interesting or dislike?

5. How is the objective test going?

   Still too hard   OK   Still too easy

6. What did you think of the subjective portion of this lesson?

7. Have you encountered similar situations to those as discussed in these Sections?

   NO   YES; please describe:

8. Other comments?

We really appreciate these evaluations and comments.

LESSON SIX

The Manager's Responsibilities in Directing and Controlling

Section 1: The Manager and Directing
Assigned Text Reading: Chapters 15, 16, and 17

Section 2: The Manager and Controlling
Assigned Text Reading: Chapter 18

> By ascertaining what jobs in this utility were measurable, and studying the time required to perform them, a team of eight employees who had been trained by consultants was able to institute plans and controls that led to greater efficiency and very large savings.
>
> James T. Rice and Eric F. Erickson, "Workload Planning and Control--A Management Tool," Journal, American Water Works Association, September 1976, p. 468.

LESSON SIX - SECTION 1

THE MANAGER AND DIRECTING*

Wilbur's concerns weren't confined to River City. The following Monday morning he received a call from Susan Palmer back in Deephaven. He'd gotten to know Susan over the past few years, and was very impressed with her ability.

Three months ago Susan Palmer had been promoted to head of the business office of Deephaven's Water Pollution Control Authority. Although the position required Susan to handle office arrangements, customer contact and supervisory activities, her primary responsibility was to be certain that all business affairs of the Authority were handled properly and efficiently.

The new job had been more frustrating than Susan had anticipated. Only 29 years old, she was younger than most supervisors and was now the youngest department manager. Although Susan had first thought she might experience the most difficulties with older women, this fear had not materialized. Instead, Susan was having trouble handling her four direct assistants, people she had worked with for several years.

"What's up, Susan?" Wilbur asked

"It seems as if things aren't hanging together, Wilbur. Libby Deane is one problem. Libby is two years younger than I am and handles Accounting, the job I held before my promotion. Libby used to be an assistant under me. Although Libby now has Accounting responsibility, she continually comes to me with minor problems for me to make trivial decisions. I have repeatedly told Libby that she now has charge, with the freedom to make independent decisions. This advice has met with only limited success."

"John Hibbard is another problem. He handles Purchasing. Hibbard is several years older than I am, but came with the Authority less than a year ago. I feel that he still resents my promotion--that he should have become department head. John apparently ignores me on many problems which I feel we

---

Adapted from Study Number Three, Training, August 1971, page 30.

should work out together. Instead, John goes directly to my boss, Mr. Edelson, for many decisions. When I recently confronted John with my disapproval of this, he said he just happened to see Mr. Edelson on the one or two occasions when decisions had to be made. He said it seemed natural to ask Edelson directly."

"Several of the others, like Frank Snell of Billing and Janice Peterson of Filing appear to be cooperative, but when I give them a priority directive they seem to do the work with no sense of urgency--setting their own priorities."

"Wilbur, I've tried to be a good guy, realizing that I'm in the difficult position of supervising people who used to be my co-workers, but it doesn't seem to be working. All of the people are competent and are doing at least acceptable work. They are friendly towards me and with each other, but have not really accepted me as the supervisor."

"At a recent office management seminar, I heard a speaker comment that a supervisor should be fair but firm. Maybe I should be more firm...maybe that would work. What should I do, Wilbur?"

* * * * *

What advice should Wilbur give Susan? Have you had a few problems in directing employees? Hopefully, this section will provide some direction to help you. Read on.

THE MANAGER AND DIRECTING

This lesson on directing will build on much of the information gained in Lessons One, Two and Three. The purpose of those lessons was to give you a foundation in management concepts. Furthermore, as a middle manager, directing is one of your main managerial functions. You may be especially interested in this lesson.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Function of Directing?

- The meaning of directing?
- The variety of ways in which the supervisor is called upon to exercise this directing function?

What is Meant by Directives?

- The characteristics of a good directive?
- How to evaluate the reasonableness of a directive?
- How to differentiate between the different styles for wording directives, and to choose the most appropriate one?

The Approaches to Supervisory Direction?

- The approaches to supervisory direction?
- The advantages and disadvantages of each approach?

Value of 'Why' for the Supervisor?

- Why it is important for the supervisor to put the'why' into directives?

The Importance of Change?

- The reasons for reaction to change?
- How to introduce change positively?

Why Morale is Important?

- Which factors influence morale?
- The relationship between morale, teamwork, and productivity?
- How to measure morale?

What Makes Discipline Important?

- The difference between the concepts of discipline and morale?
- What is considered the best discipline?

When Disciplinary Action is Important?

- How best to take disciplinary action?
- The types of disciplinary action available?
- The importance of the time element?
- The factors surrounding the imposition of disciplinary action and their relevancy?
- What is meant by the right to appeal?

THE MANAGER AND DIRECTING

Assigned Text Reading:
Chapter 15, Giving Directives and Introducing Change
Chapter 16, Understanding Morale
Chapter 17, Positive Employee Discipline

Directing is presented as the link between the preparation type managerial functions and the checking-up type functions. In order to provide the best possible linkage in your own job performance, study this lesson carefully.

KEY POINTS

Directives

It is important for the water or wastewater utility supervisor to be conscious of the *unity of command*, the direct link between the supervisory authority and the employee.

Some of the important points to note concerning directives may be incorporated into the following checklist:

1) Is the directive reasonable?
   (Can the orders really be accomplished?)
2) Is the directive intelligible?
   (Can the employee understand the directions?)
3) Is the directive appropriate?
   (Should the supervisor use the form of a command, a request, or a suggestion?)
4) Is the directive compatible with the organization and department objectives?
5) Is there a time limit specified?
   Is this time limit reasonable?

Approaches to Supervisory Direction

Notice how similar the approaches in this function are to the theories which were discussed previously. As in that (and this) discussion, the idealistic extremes will be described. In reality, a blend is often the case.

Autocratic, Close Supervision

The manager using this type of approach would give what type of orders? He would give clear, precise ones--very detailed.

Unfortunately, this type of order-giving, this approach in general, does not often produce the best type of motivation, since employee resentment builds while training and preparation for independent work does not. Another negative aspect of this approach is that the supervisor usually resorts to threats to induce employees to follow those orders.

Consultive, General Supervisory Approach

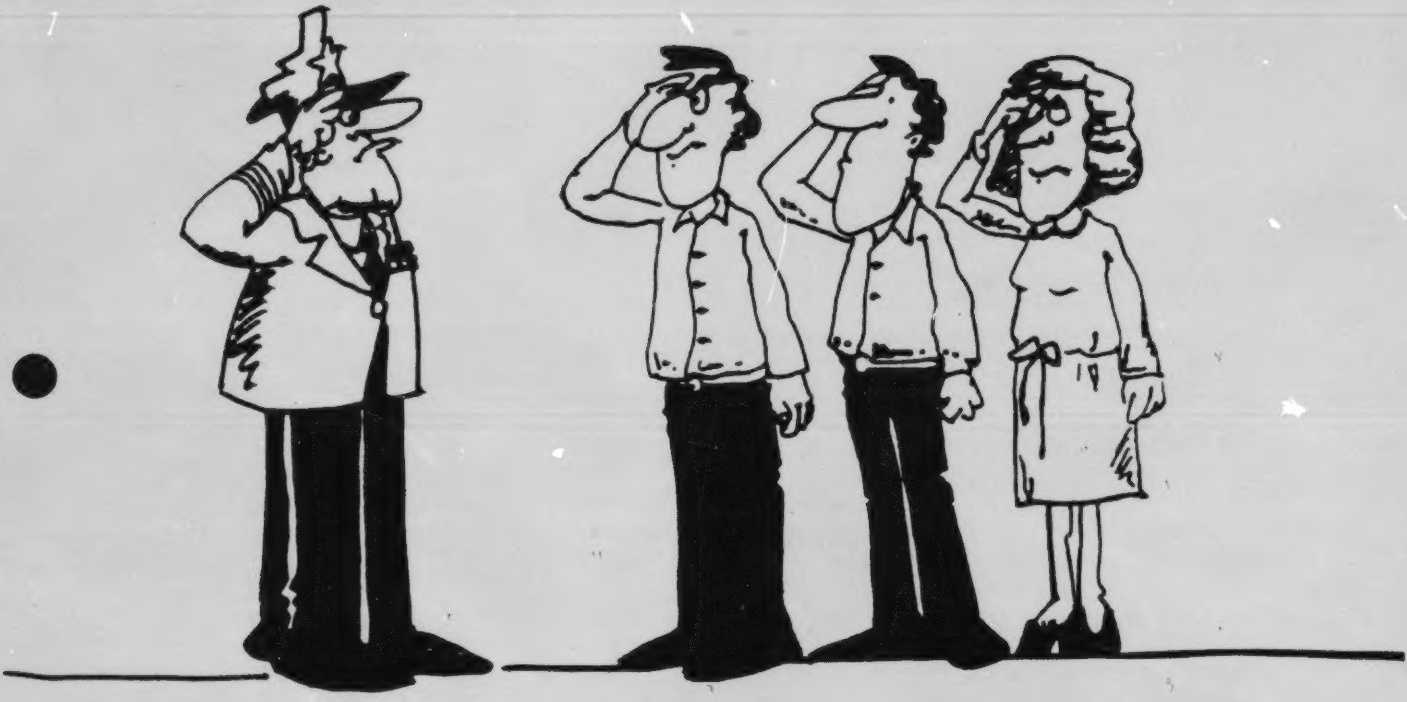
This type of approach, as its very name implies, involves a great deal of cooperation and consultation between the supervisor and the employees. The idea here is that if the shift operator helps to plan the work program, he will have less trouble (and far more motivation) in carrying out those orders.

Why

The general supervision aspect on the job involves explanations such as improving safety, housekeeping and meter records. It requires the supervisor to have some good reasons for the directives, and the ability to describe those reasons to the employees so that they understand. However, once explained in this fashion, the supervisor's work is easier because the employees will be able to handle more of the responsibility.

Change

The idea of explaining 'why' carried over into introducing change. It is important to clarify the reasons for a change to employees. The reasons are often known to the middle manager, but may not be so obvious to the employees. Whether these explanations involve imparting adequate information or whether they involve a joint decision on the part of the supervisor and the employees is up to the supervisor and the situation.



Autocratic supervision builds employee resentment.

Morale

Morale and motivation are not the same but they are connected. High production and high morale are also connected. With such connections, it would appear that the supervisor should strive for high morale.

Development of Morale

The manager should realize that there are two types of factors influencing morale. External factors really cannot be greatly affected by the supervisor while the internal ones can. It is better for the supervisor to concentrate on those factors which are in his control. These internal factors are similar to the factors influencing motivation. While monetary incentives are important, they are not the only morale boosters. As is pointed out, often the supervisor's attitude and his relationship with the employees have a far greater effect.

Measuring Morale

The manager has many options for measuring morale. The first, observation, is less tangible than the second, surveys, but it can provide great insight into the morale of the department. Interpretation may be more difficult, however.

The surveys taken to determine morale levels may tend to indicate that certain changes ought to be made. It is extremely important, for the sake of morale and motivation, that the supervisor carry out these changes. If he does not, the effect of the survey will be to lower morale rather than to increase it.

Discipline, Positive

The text uses the terms, *positive discipline,* instead of just discipline. Again, this reflects the approach of the textbook to supervision. Think and act positively. However, this also appears to be a good approach to discipline.

Self-discipline is to be desired, but take note of the warning that supervisors must set the example. In medium to small utilities, plant shift operators and meter readers, for example, are often isolated, working on their own. They must be highly disciplined to complete assigned tasks satisfactorily.

Disciplinary Action

Notice the sequence of steps surrounding disciplinary action. The supervisor should be careful not to neglect any of the following:

a) investigate before taking any action (and don't lose your temper).

b) if action is needed, do it IN PRIVATE.

c) suit the type of discipline to the offense, the employee, and the situation, using informal talk, oral warning or reprimand, written and official warning, disciplinary layoff, demotion, or discharge. Observe union agreements, if any.

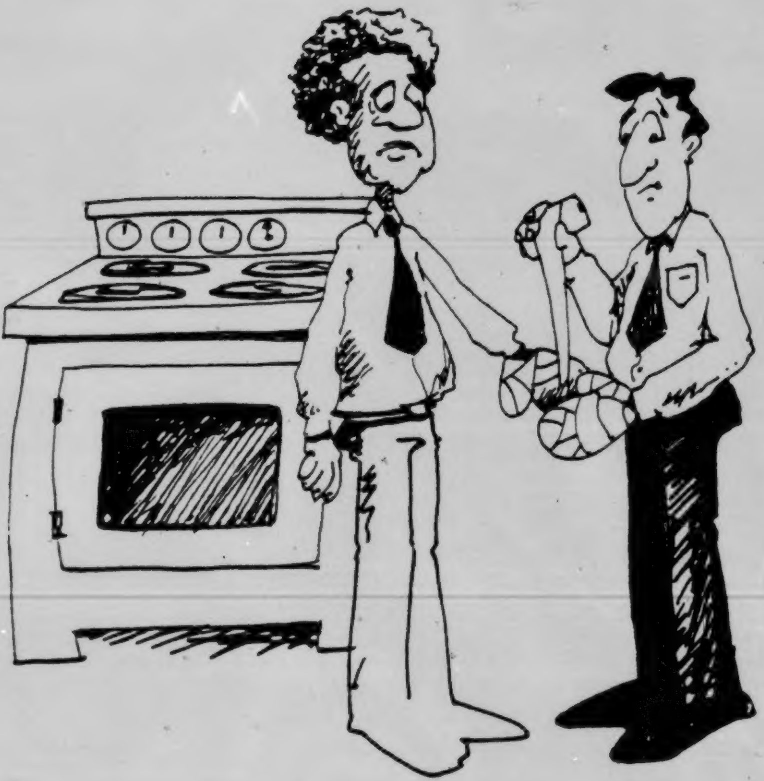
Written reprimands are often an effective means of discipline.

In disciplinary action, timing is greatly important. Not only does timing tend to relate the offense to the disciplinary action; it also provides less resentment afterwards.

The Hot Stove Rule

Remember this rule concerning discipline. If you touch a hot stove, you will immediately be punished. One is usually warned that the stove is hot. If one touches the hot stove, one will get burned, a very consistent occurence. Finally, it does not matter who touches the stove, all will be burned, a very impersonal sort of affair. Disciplinary action should follow the same points.

* * * * *



The Hot Stove Rule

REVIEW

This lesson with its added emphasis on morale and positive discipline should have provided you with a number of ideas for improvement in your own job. You can undoubtedly view incidents in your own experience where your superior could have used better solutions or techniques in handling morale and discipline. There are plenty of opportunities to affect morale. Everything that affects the individual: the coffee breaks, special uniforms, use of company vehicles, overtime work, recreational activities (bowling, golf, tennis leagues) all have an effect on employee morale.

In those instances where discipline is required, judgment is required to make the "punishment fit the crime." The objective is always to improve the employee's productivity, not to destroy his desire for improvement.

FUTURE REFERENCE

Caskey, C. C., "The Four Functions of Management, Journal, American Water Works Association, June 1972, pp. 361-366.

"NINE STEPS TO GIVING ORDERS THAT GET RESULTS"
(Test yourself on your order giving. Give yourself one point for each statement you can check. Rating is at bottom of page.)

__(1) Have some standards of performance-standards to organization.
__(2) Let the "situation" appear to be the authority.
__(3) Try for unity in the groups.
__(4) Be systematic in assignments.
__(5) Explain clearly, and ask for feedback.
__(6) Offer support and assistance.
__(7) Avoid ambiguity--check your reception.
__(8) For experienced subordinates--specify results, not methods.
__(9) Use teaching methods to direct.

Corey, John B. W., "Getting the Employee Into Action Now," Journal, American Water Works Association, January 1973, pp. 39-41.

"Employee morale is not only a quality that can be sensed, it can be measured. The manager who permits himself to lose sight of the need for evaluating employee-management relations can find himself unexpectedly confronting troubled times."

Davis, Keith, Human Behavior at Work, Fourth Edition, New York, McGraw-Hill Book Company, 1972, pp. 160-164,165-172, 243-247, 132-133.

"Individuals in the social system tend to resist many types of change because new habit patterns or sacrifices are required. This leads to the general proposition that people and their social systems will often resist change in organizations. In fact, fear of change can be as significantly disrupting as change itself, because it produces identical symptoms."
"A person's emotional reasons for resistance to change will be summarized in this manner:

1. Economic reasons
   Fears technological unemployment.
   Fears reduced work hours.
   Fears demotion and reduced wage base.
   Fears speed up and reduced incentive wages.
2. Personal reasons
   Resents implied criticism that present method is inadequate.
   Fears that his skill, and personal pride in it, will be reduced.
   Expects greater specialization, resulting in boredom, monotony, and decreased sense of worthwhileness.

Number	*Rating*
0-5	*You've got trouble*
5-7	*Average*
7-9	*Superior*

Personal reasons, continued
Dislikes effort required to relearn.
Fears harder work will be required.
Fears an unknown which he does not understand.

3. Social reasons
Dislikes making new social adjustments.
Dislikes breaking present social ties.
Fears the new social situation will bring reduced satisfaction.
Dislikes outside interference and/or some of the persons making the change.
Resents lack of participation in setting up the change.
Visualizes the change as mostly benefiting the company, rather than himself, his fellow workers, or the general public.

"Management has three methods available to cause people to accept organizational change. One method is to alter the environmental forces which affect employees. Actions of this type include better leadership, a sales-incentive program, a change in formal organization, and new pressures to alter a person's perception of the forces which surround him. This is primarily achieved through improved communication. A third method for building support for change is to alter the basic value system of one or more persons involved in the change. Laboratory training (such as sensitivity training) and psychological counseling are often used for this purpose."

"The quality of an organization's climate is reflected in the discipline of its employees. Discipline is employee self-control to meet organization standards and objectives. It is the "taut ship" in navy jargon. It provides the self-control which underlies all genuine teamwork. Discipline relates to employee conduct, whereas morale relates to employee attitudes. Discipline is developed both by management and by the employee group. Employees themselves exert powerful influence on others in their group to tow the line, to keep up, and to "get with it". If these employee pressures can be guided to support management standards, then the group itself is a strong supportive force for discipline."

"The first level supervisor occupies a unique position as the only member of management who supervises primarily nonmanagement persons. Historical trends, such as expansion of staff groups, have reduced the supervisor's authority and security. He is traditionally looked upon as the key man, man in the middle, marginal man, worker, or human relations specialist. A balanced interpretation considers him as the keystone in the organizational arch, meaning that he effectively joins higher managers and workers into a functional whole. However, we must remember that a supervisor is not interested in definitions of his job. He is interested in whether *he feels* he is a part of management and whether *others feel* that he is."

"An effective supervisor is supportive with his work group, and he uses supervisory influence to gain support at higher levels. He uses desirable managerial styles, favors general supervision, uses the clinical method, and develops communication including vigorous staff and service contacts outside his work group. He is more likely to be effective if his own superior follows these practices also."

Dowd, Thomas F., Jr., "Employee Attitude Surveys: A Key Management Tool", Journal, American Water Works Association, January 1973, pp. 46-49.

Attitude surveys "can be especially helpful in improving relations with employees, generally, and in meeting such common business problems as defending against union-organizing drives, checking the loss of key employees, eliminating the cause of employee grievances, locating gaps in communications with employees, spot-lighting morale destroying favoritism, evaluating orientation and safety programs, and pinpointing roadblocks to maximum efficiency on the job."

Kazmier, Leonard J., Principles of Management, A Programmed Instructional Approach, Third Edition, McGraw-Hill Book Company, New York, 1974, p. 379.

The first level supervisor is in a unique position in the organization in that he is the only manager who supervises the work of non-managers. Since the ultimate attainment of organizational goals depends on what happens at the operative level, this makes the first-level supervisor's position particularly important. The success of plans and strategies determined at the top management level depends on his ability to translate them into action at the working level.

MINI REVIEW: SECTION 1

(Here is your review for Lesson Six. Do not send this in but check your answers with those at the bottom of the page.)

_____ 1. Directing is exclusively a matter of giving orders and supervising employees to make certain they follow those instructions.

a. True
b. False

_____ 2. Recognition and job security are indications of:

a. a good supervisor.
b. a good organization.
c. internal morale factors.
d. external morale factors.

_____ 3. When an employee breaks the rules and requires discipline, who is responsible for administering it?

a. the other employees
b. the supervisor
c. the personnel office
d. the upper management

_____ 4. The best discipline is:

a. authoritarian.
b. general supervisory.
c. self-discipline.
d. consultative.

_____ 5. Morale is a state of mind, but not emotions.

a. True
b. False

* * * * *

Ready for the 'Controlling' Portion of Lesson Six?
Yes? Then carry on...

ANSWERS: 1) b 2) c 3) b 4) c 5) b

LESSON SIX - SECTION 2

THE MANAGER AND CONTROLLING

Wilbur Wainwright looked over his desk with a feeling of satisfaction. He had just been thinking about his past few weeks here in River City and he was beginning to feel that he was making headway. In looking over his past progress, he was amazed to see that he had encountered problems in almost every managerial area: planning, organizing, staffing, directing, and even controlling. Controlling had not been an easy area for Wilbur to master. He remembered a discussion that had occurred not too long ago with Jack Watson over that very subject.

Wilbur and Watson had been having lunch together on a Friday. Wilbur was anticipating the weekend break from at least some of the problems encountered at the plant. As Wilbur was drinking his third cup of coffee, he thought about the function of management that was most confusing to him. He felt reasonably competent with planning, staffing, organizing, and directing functions; but he couldn't get a handle on the practical aspects of management control.

Since he felt pretty comfortable talking about his problems with Watson, he decided this was a good time to admit he didn't feel he was doing an adequate job in management control, although he could not point to any real reason why he felt that way. Wilbur started by stating simply, "Jack, do you remember several weeks ago we were discussing cost control?"

"Sure, Wilbur. The way I'm being hounded by city hall to control costs, how could I forget it? Why?"

"Well, I hate to admit it, but I don't really know how to tell if I am doing a good job of supervisory control."

"I know how you feel, Wilbur. I felt the same way when I was responsible for a plant before I moved into my current job. I don't have all the answers. However, there are several questions you should ask yourself. Some of the questions are similar to those contained in the Supervisory Audit Section on Management Control developed at Michigan State University. I'm sure you could come up with additional questions that would serve as a specific checklist to determine how to measure how adequately your management control approach is working. In fact, a good exercise for you would be to write down, say, ten to twelve critical areas that you should check periodically to see how well you're doing as a manager compared to a standard you might set for yourself. As examples:

- We set a goal of a 10% cost reduction for the year. Have you been able to achieve a 10% reduction each month to date?
- You set a goal to reduce absenteeism in Engineering and Maintenance. What has been the record since you began to resolve the problem?
- You completed a Communications Audit. What has been done to correct the communication problems?

In addition, you should study thoroughly the eight guides to supervisory control as suggested by Clark Caskey in his AWWA Journal article of June, 1972 (page 366):

1. Have standards and tolerances for every aspect of the department's work where control is needed.
2. Observe operations and measure results.
3. Manage by exception—have exception reported.
4. Check and correct systematically.
5. Identify recurring exceptions and their causes.
6. Make corrections promptly. Delay increases difficulty.
7. Seek changes to standards which can't be made.
8. Get rid of unnecessary controls when no longer useful.

After you have made up the list and reviewed the suggested guides, let's have another informal discussion over a beer after work some evening."

"Sounds great, Jack, I'm glad I didn't hesitate to let you know where I need help."

Yes, Watson had been very helpful, and Wilbur hoped he could pass some of that--a portion of that learning experience--on to others.

He had instigated some controlling measures two weeks ago, when he had been mentally reviewing the major operations in the utility. Controlling was necessary in every area, of course, but one area that had really needed some specific controlling measures had been the amount of time required for pump repair and maintenance. It had been unduly long lately. As a result, the lines had often been out of service just too long. Yes, here was an area where controlling had needed improvement.

"Hal? Wilbur here. I'd like to talk to you about our pump repair procedures. Do you have time this morning? You do. Ten-thirty, you say. Yes, that's fine. See you in my office."

Wilbur had contacted Hal Jones, as the acting head of the Maintenance and Engineering Department and had gone over some guidelines with him. He had given Hal two weeks to run a preliminary check on certain aspects in maintenance, and this morning Hal was expected to bring in his report. As a knock sounded on his door, Wilbur reflected that Hal was right on time for his 10:30 appointment. Hal's attitude and attendance had improved significantly since Wilbur had given him more responsibility.

"Come on in," Wilbur called, and Hal entered carrying a large folder. "Looks like you found some information," Wilbur commented, as he noticed the folder.

"Did I ever!" Hal reported. "We should have done this evaluation before. We've come up with some definite areas for improvement." Hal pulled his chair closer to Wilbur's desk and spread out some of his papers.

"Remember when you gave me those guidelines to work from, that checklist--here it is. Well, it's no wonder that our lines are out of service for so long. Almost every area needs some improvement here. Look, first, the size of the repair crew. Notice that for most jobs, our crew usually consists of two men, and that used to be ample for those little breaks. But these days, with the bigger pipes, those two men just can't handle the heavier equipment. We really ought to have four men, or at least three to manage everything."

"That's certainly a good point," Wilbur nodded in agreement. "But we can't just put two more men on the crew. They'll have to be trained. Do you think our current crew knows how to handle the situations we have been encountering?"

Hal nodded. "It looks like they do. At least one fellow seems to really understand how everything is supposed to operate, but it certainly wouldn't hurt to go over all the equipment and their functions again."

"In fact," Hal added, "I think a bigger crew would solve another problem that became evident. Interruptions are a major problem for the crew. Here they are, trying to get that pump back into operation, but they often have to keep checking on little things. If we could have a fellow or two backing them up, to handle little things like making sure all the proper tools are in the right place on the repair truck, we'd have much faster service."

"Plus," Hal was really excited at these discoveries. "Look at the results of these three different sewer cleaning crews. See how this one, number two, has been having less trouble with backed up drains and flooding. I looked over their entire records, and guess what I found. This crew's chief has been running his men and equipment into this area every other year, not every fourth year like we suggest. Look at his graphs of stoppages. This indicates that stoppages can be reduced by 30 to 50 percent if we follow a policy of more frequent cleaning."

"Observations like this are one of the major reasons for these control policies," Wilbur felt greatly encouraged by the information.

"Should I provide some estimates for future budgetary measures?" Hal asked.

"Yes, good point, Hal," Wilbur commented. "Everything you say seems highly substantiated by these reports." Wilbur was flipping through the other pages in Hal's folder. "I think your case is pretty clear for needing more cleanings and more crew. Why don't you go through and give me both the budget estimates and the job descriptions for the additional people you'll need. We may be able to transfer some persons within the plant, but we'll probably have to hire some from the outside too. It will cost us, I know, but this improved productivity ought to result in lower maintenance costs due to less time per overhaul. Plus, those crews will probably have a terrific boost in morale once they finally have the right number of people to work with--and a more suitable cleaning schedule. I think we will even end up saving money in the long run--not to mention the improvement in public relations that we'll have from faster and more efficient service."

Hal smiled, already feeling that these things were on the way to being accomplished. "Right you are, Wilbur. I'll see if this can be finished by Friday."

* * * * *

Do you have a handle on control procedures? Feeling somewhat relieved to find that others find themselves in the same confusion? This section should give you some insight into the fifth managerial function, controlling.

THE MANAGER AND CONTROLLING

The fifth managerial function, control, is another of those high priority areas for the middle management ranks. The text devotes only one chapter to this function but it covers most of the essentials in this area.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Relationship Between Control and the Supervisor?

- The function of controlling as it relates to the managerial functions?
- How control is interlinked with the other functions?
- Some of the common misconceptions that supervisors have of the controlling function?

The Requirements of the Control System?

- Some of the most important requirements of the control system?
- What is meant by being understandable, appropriate, rapid registration of deviations, flexible, and pointing to corrective action?

How the Control Process Operates?

- The basic steps in the control process?
- What is included in each step?

How to Deal with Budgets?

- How and why the budget is one of the major supervisory controls?
- The importance of the supervisor's participation in the creation of the budget?

THE MANAGER AND CONTROLLING

Assigned Text Reading:
Chapter 18, Control: General Considerations and Budgets

Whether using the budget, or another type of control tool, the middle manager must practice the managerial function of controlling to a greater extent than perhaps any other function. Following are some of the main points to remember.

KEY POINTS

To the Future

The supervisor must realize that his orientation should be toward the future. "Learn from the past and look toward the future" would be a good motto. In order to control the future as much as possible, the supervisor must keep track of the present--catching, as the text notes, all deviations from the stated plans as soon as possible.

Notice the emphasis on employee self-supervision. Here is where the delegation of authority and responsiblity are important. It is up to the supervisor to select and train employees so that he has confidence in their ability to get the job done.

Control System Requirements

The text lists several requirements for the control system:

1) that it is understandable (or, that the supervisor knows how the controls work). Note that a control system NEED NOT be complex.

2) that it registers deviations quickly (so that delays are prevented as far as possible).

3) that it be appropriate, adequate, and economical. (This borders on the first point, but it refers to the applicability of the control system for the department or organization involved).

4) that it be flexible (so that the control system can cope with the changes which occur and still function).

5) that the control system indicate the corrective action to be taken.

Basic Steps in the Control Process

These steps are ingrained in the text--set standards, check and appraise performance, and take corrective action.

Setting Standards

The statement "control implies checking work performance against criteria by which results are to be judged," is a good indication of the need for standards. Work must be measured to know how far it has progressed, and there are several basic means for accomplishing this: a motion study--perhaps combining steps; and a time study--determining the standard time to do the job.

Again, it is stressed that worker cooperation is not only desirable but essential here. The supervisor would do well to observe the intangible standards as well as the more tangible ones.

Strategic control points help the supervisor keep track of progress. Note that their purpose is to "provide for comprehensive and balanced control and to permit economical observations." Notice the control points of Professor Flippo on page 372 of the text.

Checking and Appraising Performance

The manager has two basic methods for checking performance. He can check by direct observation and by reports. The "exception" method indicates that the supervisor looks for the exceptions rather than the standards.

ANNUAL REPORT

A manager can check performance by observation and through reports.

Taking Corrective Action

This step is only taken when there is need for such action. Like problem solving, the manager must first get to the real problem, and then solve it.

Budgeting

The budget is the most common of controlling tools for the middle manager and supervisor. A budget sets standards, provides for observation points on progress and gives the supervisor the necessary information to take possible corrective action.

Notice that budgets, whether stated in financial terms or otherwise, provide a highly quantitative type of measurement--one that is easily calculated. Again, it is pointed out that the supervisor should, if at all possible, gain worker cooperation in preparing the budget.

Flexibility

This is a term not usually immediately associated with budgets--but, like other good control tools, budgets must be flexible.

Other Controlling Tools

The other tools for control available to most middle managers appear to include scientific and statistical tools, and graphic presentations.

REVIEW

This lesson has concerned the supervisor's relationship to the controlling function of management and controlling devices. The Subjective Portion contains another part of the management audit which can be used as a controlling device to check performance, illustrating the second step in the control process.

FUTURE REFERENCE

Baker, James B., "Management Accounting Tool Aids," Journal, American Water Works Association, November 1971, pp. 692-695.

> "One prerequisite of effective control over operations is that there be a correlation between organizational and financial accountability. In other words, a person in a position of responsibility should be held accountable for the cost of handling the function assigned him."
>
> "Responsibility accounting produces some interesting management advantages. First, the responsible manager is held personally responsible for his financial management; second, his financial performance can be measured in relation to the responsibility assumed; third, the preparation and evaluation of budgets is facilitated; and fourth, the cost of specific activities, such as inspecting developer-installed water system improvements can be measured more readily."

Baldock, E.H., "Toronto's Approach to Preventive Maintenance for Treatment Plants," Journal, American Water Works Association, Vol. 67, No. 11, November 1975--Part I, pp. 614-615.

> "Preventive maintenance is a crucial issue for treatment plants that must be kept in continuous operation. This article examines the use of computers as a means for assisting maintenance supervisors and ultimately reducing the amount of time necessary for determining exactly the problem situation that requires maintenance."

Caskey, C.C., "The Four Functions of Management," Journal, American Water Works Association, June 1972, pp. 361-366.

Eight guides to supervisory control:

1) Have standards and tolerances for every aspect of the department's work where control is needed.
2) Observe operations and measure results.
3) Manage by exception - have exceptions reported.
4) Check and correct systematically.
5) Identify recurring exceptions and their causes.
6) Make corrections promptly. Delay increases difficulty.
7) Seek changes in standards which can't be made.
8) Get rid of unnecessary control when no longer useful.

Helferich, Omar Keith, "Management Systems: Total Utility Perspective," Journal, American Water Works Association, November 1973, pp. 670-676.

> "Today modern management in business, with its greater complexities, requires a close check on the entire scope of management control and performance. The objective is to achieve the most effective and efficient administration of the total business operation with continuous improvement in policies and procedures."

Kazimer, Leonard J., Principles of Management, McGraw-Hill Book Company, Section V, Controlling, 1969, pp. 413-509.

> "The management functions of planning and controlling are closely related in that whereas planning is concerned with the formulation of objectives, controlling is concerned with ascertaining that the objectives are achieved. In this sense, activities in a firm are set into motion as the result of managerial planning and are "kept on the right track" by means of the control process."
>
> "One of the most significant of the newer control techniques, and one that has had extensive application in the defense and aerospace industries, is the Program Evaluation and Review Technique. Consistent with many other recently developed control procedures, it is primarily directed toward the control of time."
>
> "The Special Projects Office of the U.S. Navy first introduced the use of the Program Evaluation and Review Technique in the Polaris project in 1958. The Navy has stated that because of the use of PERT in this project, the Polaris missile submarine was brought to combat readiness about two years ahead of the original scheduled date, thus dramatically illustrating the value of PERT in the control of time or scheduling."
>
> "At about the same time that the Navy was developing PERT in cooperation with the management consulting firm of Booz, Allen & Hamilton, the DuPont Company was concerned with the time and cost required to bring new products from research to production and independently developed a similar technique known as the Critical Path Method (CPM). Like PERT, CPM is primarily oriented toward achieving better managerial control in respect to time. Although the principal traditional control devices, particularly budgeting, are cost-oriented, some of the early methods of production scheduling can be considered as forerunners of PERT and CPM. Of these, the most important is the *Gantt Milestone Chart*. Henry L. Gantt was a contemporary of Frederick W. Taylor, and thus, he is generally identified with the scientific management movement discussed in Chapter 1."

FUTURE REFERENCE (continued)

Massoff, George, "Computer Customer Billing," Journal, American Water Works Association, Vol. 67, No. 5, May 1975. pp. 278-279.

Do you, as a manager, utilize the computer in reducing operating costs? No, you say, because your utility does not have a computer. This article describes how one computer services several utilities.

McWhinnie, Robert C., and Spaulding, J. M., "Responsibility Budgeting: A Management Tool," Journal, American Water Works Association, May 1972.

"The age-old ideal of assigning responsibility for accomplishment and expenditure controls must be reestablished for the decision makers if the system is to be managed. Responsibility for both the budget and the physical accomplishment will allow the manager to manage and to be held accountable."

Ozan, Turgut M., "Controls for Operations Management," Journal, American Water Works Association, February 1972, pp. 75-81.

"The term control indicates a cycle composed of a plan of operations, decisions on and authorization for performance, performance of operations, constant comparison of performance against the plan, and corrective action as needed." The basic purpose of control is to detect problems while they are forming so that adjustments can be made before final results.

Perry, Robert R., "WPCF Role in Improving O & M," Journal, Water Pollution Control Federation, Vol 49, No. 7, July 1977. p. 1567.

Author Perry notes that the General Accounting Office has pointed out the need for improved operation and maintenance of municipal waste treatment plants. He includes a listing of some of the areas specially noted, such as inadequate control over industrial waste.

Piecuch, Peter J., "EPA Charts Policy for Deadline Enforcement," Journal, Water Pollution Control Federation, Vol. 49, No. 7, July 1977, pp. 1569-1571.

One aspect of this article is the inclusion of the EPA priorities for municipal enforcement strategy, starting with number one: all major municipalities should be committed to achieving secondary or more stringent treatment.

Rice, James T. and Eric F. Erickson, "Workload Planning and Control--A Management Tool," Journal, American Water Works Association, Vol. 68, No. 9, September 1976, pp. 468-470.

Consultants are traditionally used in the analysis and improvement of operations. However, this article describes the use of consultants as trainers, in teaching selected employees to act as their own controllers.

Roeder, Betty B., "EFTS for Automatic Payment of Water Bills," Journal, American Water Works Association, Vol. 68, No. 10, October 1976, pp. 509-510.

"An automatic billing and payment system utilizing an Electronic Funds Transfer System has lightened the workload and improved the cash flow of this utility," states author Roeder. (It is good to see women authors starting to appear in utility trade publications).

Watkins, Jack Jr., "Can a Computer Really Operate a Water-Filtration Plant?" Journal, American Water Works Association, Vol. 67, No. 7, July 1975. pp. 351-352.

If computers become adapted to operating utility systems, then the managerial role will develop even MORE importance. Watkins especially notes the aid which the computer provides in the area of control.

MINI REVIEW: LESSON SIX

Here are some questions for you to use in preparation for the following objective test. Do not send this in but check your answers with those at the bottom of the page.

_____ 1. Using the control function correctly means that:

a. employees never work on their own.
b. employees work on their own, with no checkpoints.
c. employees work on their own, with possible supervisory checks.
d. employees and the supervisor work hand in hand.

_____ 2. Controlling is connected to all, but is probably closest to what other managerial function?

a. managing
b. planning
c. staffing
d. organizing

_____ 3. Budgets are one aspect of control that should not be flexible.

a. True
b. False

_____ 4. In reviewing reports, a supervisor:

a. passes over the majority and concentrates on the exceptions.
b. reads everything carefully.
c. assigns an understudy to ready everything carefully.
d. does not really look at any of the reports.

_____ 5. Which one of the following is NOT a basic step in the control process?

a. setting standards.
b. checking and appraising performance.
c. taking corrective action.
d. selecting employees for understudies.

* * * * *

ANSWERS: 1) c 2) b 3) b 4) a 5) d

TEST SIX INTRODUCTION

In the subjective portion of Lesson Six, you will be asked to complete the last section of the Supervisory Management Audit. We hope these audits have provided you with greater insight into your management techniques. (Lesson Seven's summary audit will bring to light any changes or improvements). The other portion of the subjective test will allow you to apply the Management Systems Approach to control problems that exist in your utility. Many students have had high praise for this lesson and some representative comments are found below.

"Good lesson! Control is probably the most common function overlooked by managers in the wastewater field." PDH

"This controlling is new to me. It makes good sense and I've learned from it." DS

"I didn't realize the importance of controlling by exemption and using test control points. However, I now know how to use them to improve quality and explain the importance of certain tests to plant functions. I have learned much that should improve my supervisory abilities. I know I will make mistakes, however, I now have a guideline and a manual to refer to." PDS

"I enjoyed this lesson above all others and really enjoyed trying to solve the problem." DLI

"The establishment of various control measures (summaries of sick leaves, comparison of expenses with the previous year, etc.) had to be created in our utility since there previously were none. This lesson first pointed out the importance of such control measures." PRB

"The fact that Wilbur questions how well he is doing seems to me to be a good sign. More input from superiors would be a big help. I often encounter situations where 'they' imply that if you weren't doing a good job, 'they' would let you know. It seems like a negative approach." VB

"I've realized before that to set up and implement plans isn't enough. Results must be obtained and programs controlled to be successful." WAH

"I plan to utilize this material and complete the audit again after three months. I hope to see better results." TE

"I cannot divide this lesson into most or least interesting parts because I have more interest in this entire lesson than any which has gone before. I suppose we are not really as conscious of the function of controlling as the others. We probably tend to rely more on built-in controls such as reports, long sheets, lab sheets, and company policy and do not really realize the comprehensive aspects of control. This is true, I would say, especially in more intangible areas such as public relations, personnel relations, etc." DMW

Lesson Six
Answer Sheet
To Be Sent In

LESSON SIX

SUPERVISORY MANAGEMENT IN THE WATER AND WASTEWATER FIELD

I. Objective Test for Lesson Six---complete this section

II. Subjective Portion of Test
Part I. Answer the questions on the sheet provided
Part II. Answer the questions on the sheet provided
Part III. Answer the following questions from the Supervisory Management Audit on the answer sheet provided.

STUDENT'S NAME________________________________

ADDRESS________________________________

____
CITY STATE ZIP

This is the second to the last lesson which means you are almost finished with the course. Start Lesson Seven as soon as possible.

Finished? Then just send this to:

Self Study Course Coordinator
432 Eppley Center
Michigan State University
East Lansing, MI 48824

OBJECTIVE ANSWER SHEET
(circle the correct answer)

1. a b c d
2. a b c d
3. a b c d
4. a b c d
5. a b c d
6. a b c d
7. a b c d
8. a b c d
9. a b c d
10. a b c d
11. a b c d
12. a b c d
13. a b c d
14. a b c d
15. a b c d

	PASSING		NOT PASSING
Objective Test Score Number Right:	15 14	13 12 11	10 9 8 7 6 5 4 3 2 1 0
Subjective Portion			
Part I A.	Superior	Satisfactory	Not Satisfactory--do over
Part I B.	Superior	Satisfactory	Not Satisfactory--do over
Part II	Superior	Satisfactory	Not Satisfactory--do over

Note: BOTH the Objective Test and the Subjective Portion must fall into the Passing category for you to receive credit for this lesson. If any part is NOT acceptable, please rework that part to receive credit.

IF YOU HAVE ANY QUESTIONS, PLEASE DO NOT HESITATE TO WRITE IMMEDIATELY.

Lesson Six
Objective Test
Keep this page in
your book

OBJECTIVE TEST: LESSON SIX

(place answers on the sheet preceding these questions)

1. The hot stove rule stresses the idea that ______________.

   a. the person should be punished
   b. the act should be punished
   c. all who disobey will be punished
   c. punishment is a natural result of disobedience

2. Morale refers to ______________.

   a. ability
   b. actions
   c. aptitude
   c. attitudes

3. Disciplinary problems for the supervisor are, by definition, limited to actions on the job.

   a. True
   b. False

4. "Directing" includes motivating employees.

   a. True
   b. False

5. A limited number of key indicators which provide the supervisor with a a good sampling of overall performance are _____.

   a. intangible standards
   b. work measurement
   c. strategic control points
   d. tangible standards

6. The concept of unity of command refers to ______________.

   a. a direct line of authority
   b. a cohesive grouping of employees
   c. the common bond between all supervisors which insures that no conflicting orders are given.
   d. written orders, which leave no room for variation.

7. The supervisor's first action in taking disciplinary action should be to ______________.

   a. discipline in private
   b. use positive discipline
   c. use self-discipline
   d. investigate thoroughly

8. Coordinated and synchronized activities achieved by a closely knit group are achieved through _____.

   a. morale
   b. change agents
   c. teamwork
   d. positive discipline

9. The most severe form of discipline is a _____.

   a. disciplinary layoff
   b. demotion
   c. discharge
   d. written or official warning

10. The autocratic supervisor is one who generally follows a _____ type of approach.

   a. Theory X
   b. Theory Y
   c. Maslow
   d. Skinner

11. Progressive discipline is _____.

   a. emphasizing only the positive or correct actions (rewarding the good).
   b. based on the idea that given too much rope, the employee will figuratively hang himself.
   c. based on the idea that the penalty becomes more severe with increasing offenses.
   d. named so because the offender is subjected to the disapproval of supervisors going up the ranks with each offense.

12. The supervisor who generally assumes that people need to be urged on and closely supervised illustrates which approach to supervision?

   a. Theory X
   b. Theory Y
   c. general
   d. consultative

13. The second step in the process of control is _____.

    a. setting standards
    b. incorporating worker cooperation
    c. checking on performance
    d. taking corrective action

14. Communication regarding future changes is vital--but always flows from the top down.

    a. True
    b. False

15. A budget is a planning device which is also used in controlling.

    a. True
    b. False

NAME________________________

Lesson Six
Subjective Portion
To Be Sent In

SUBJECTIVE PORTION, PART I, A.

Use this sheet and an additional one if necessary.

PART I, A. Watson has asked Wilbur to develop a list of specific questions that he could use as a checklist to determine how well he is achieving management control. Although you probably have slightly different responsiblities and situations than Wilbur, a basic checklist will possibly include many similar items.

Develop ten to twelve specific things which should be checked to evaluate your performance. For example:

-- Is my absenteeism rate below ____?

-- Are my costs below ____?

-- Does my staff (or do I) spend at least ____ hours per week on training?

If you already have such a list, please send it in and indicate how you utilize the checklist to improve your area of responsibility.

NAME________________________

SUBJECTIVE PORTION, PART I, B.

PART I, B. Select at least one of the specific items from your own list and, using the Management Systems Approach discussed in Lesson Three, Section 1, develop an approach to improving the selected performance measure(s). Be as specific as possible and consider the impact of the suggested improvement method on the other performance measures in your list. (After completion of the exercise, attempt to implement your improvement approach.)

When you have completed Part I, go right on to Part II which is another portion of the Supervisory Management Audit....

NAME ______________________________

SUBJECTIVE PORTION, PART II

SUPERVISORY MANAGEMENT AUDIT ANSWER SHEET

G. Labor Relations

	YES	NO	NOT APPROPRIATE
1.			
2.			
3.			
4.			
5.			
6.			
7.			
8. a			
b			
c			
d			
e			
f			
g			
h			
i			
j			
k			
l			

SUBJECTIVE PORTION, PART II.

PART II. SUPERVISORY MANAGEMENT AUDIT (CONTINUED FROM LESSON FIVE)

Answer the following questions on the answer sheet provided.

G. Labor Relations

1. Are you permitted to express your opinions in reference to labor negotiations?
2. Are you kept informed about the course of labor negotiations?
3. Do you keep records that would be useful in labor negotiations (incidents, absenteeism, productivity, etc.)?
4. Do you thoroughly understand the labor agreement?
5. Do you consult with higher management on labor clauses for interpretation?
6. Is appropriate action taken if a subordinate does not comply with contract provisions?
7. Can you develop a proper relationship and communication with the union stressed?
8. Do you observe the following check list for grievances?
    a. be available to the shop steward and to any aggrieved employee?
    b. listen to the grievance?
    c. do not become angry?
    d. summarize what has been presented and define what is actually the problem?
    e. get the facts related to the grievance?
    f. check the labor agreement to determine if the contract has been violated?
    g. settle the grievance as soon as possible?
    h. consider consequences of the settlement to make certain the decision is consistent?
    i. be as consistent as possible explaining any exceptions?
    j. answer each grievance in a straight-forward, reasonable manner?
    k. adjust grievances at the first step of the grievance procedure if possible?
    l. keep records on all settlements?

NAME ______________________

Lesson Six
Evaluation Sheet
To Be Sent In

EVALUATION SHEET - LESSON SIX

Please take just another minute to complete this evaluation sheet. YOUR ANSWERS WILL PROVIDE US WITH YOUR OPINION OF THIS LESSON, and are one of the prime means that we have for improving the course.

1. How accurate and appropriate did you find the illustration for Section One? (Circle the best answer or write your own)

   Very realistic   So-so, at least it did not turn me off   Basically inappropriate

   Other:

2. What about Section Two?

   Very realistic   So-so, at least id did not turn me off   Basically inappropriate

   Other:

3. What part did you find most interesting?

4. What part did you find least interesting or dislike?

5. How is the objective test going?

   Still too hard   OK   Still too easy

6. What did you think of the subjective portion of this lesson?

7. Have you encountered similar situations to those as discussed in Sections One and Two in your position? (present or past)   YES   NO

   If YES, could you briefly describe these instances? (You may use the back of this sheet)

8. Other comments?

We really appreciate these evaluations and comments.

LESSON SEVEN

Managerial Relations with the Union and Employees

Assigned Text Reading: Chapters 19 and 20

> In order for any organization to "live" with a labor union, it must first understand the nature of a union and the pitfalls of having to deal with one.
>
> John F. Stoner, "Living with Organized Labor," Journal, American Water Works Association, January 1977, p. 19.

LESSON SEVEN

MANAGERIAL RELATIONS WITH THE UNION AND EMPLOYEES

Wilbur Wainwright had been in River City for a month now, and felt fairly confident that things were certainly going more smoothly than when he had arrived. He was reaching for the operations manual on his desk when Mildred appeared in his doorway and asked him if he had time to discuss a problem with Doug Court, head of the research and laboratory section.

"Sure," Wilbur said, "Doug, come on in--what's the problem?"

"Well," Doug began, "It is about this union idea. My workers are really hot for unionizing, but I am really against it. And, yet, I do not want to hold them back, or it will look as if I am against progress."

"My experiences with unions have been varied, too," Wilbur conceded, "but my feeling is that the benefits outweigh the problems."

"I guess my prior experiences have influenced me," Doug admitted. "Let me tell you what happened at the last utility I was at before I came to River City. I needed a new lab technician, because my best man had just moved away. This utility had a strong union, and everything had to be run by the book. Well, I started by announcing the position, and looking for qualified persons. I was then approached by the union representative who informed me that I had to fill that position with the most senior person in the utility. I did not worry about that, and even agreed with him, saying that I intended to hire the most qualified person, and that I presumed that the best person would most likely have seniority. Well, this union rep kept emphasizing this seniority bit, and finally pulled out the regulations book which emphatically pointed it out. And the word 'qualified' was not even in there, but seniority certainly was. Do you know what happened, Wilbur? You probably could not even imagine it!"

"You're making me curious," Wilbur encouraged Doug to go on, "who did you hire?"

"The janitor." Doug exploded. "I had to hire the janitor, because he had the greatest seniority, even though he was totally unqualified for the job. I had to have him in the position for ninety days and give him all the help that I could to handle the post before I could hire someone who was qualified to really take over the position. The union representative was right there--not giving me any help on training this fellow or helping the other lab technicians do the extra work until a more qualified person could come in, but just overseeing the whole thing--to make sure that everyone's rights were being maintained. Rights, nothing. Ask those other technicians who had to work overtime, without the proper pay just to keep the lab running. And the poor janitor, he had no idea of what to do, or even really why he was there. It was a mess. And, now I suspect we'll have the same hassle here."

"Well, Doug, I think you can rest a bit easier on that account," Wilbur encouraged him. "We're just coming in on the ground level of the union installation here which means that if we cooperate, we will have an opportunity to help in constructing the rules so that both the workers and the management will get a fair shake. I think you should be able to provide some valuable experiences so that we will not have some of those problems appearing here."

* * * * *

Have you had any difficulties with unions or union-related matters? Successful dealings with unions do not come from avoiding or ignoring such issues, but from facing the issues fairly and squarely. Here are some points to watch for in dealing with unions.

MANAGERIAL RELATIONS WITH THE UNION AND EMPLOYEES

"How do I deal with the union?" has been one of the chief questions of water and wastewater utility managers. This lesson should provide some answers to that question. This lesson will be concerned with relationships with labor, with labor unions, and with employee grievances.

QUESTIONS TO ASK YOURSELF: DO YOU KNOW...

The Role of the Supervisor in Labor Relations?

- The advantages, physical and psychological, which a labor union offers workers?

The Relationship of the Supervisor to Labor Unions?

- Why labor unions appear to be a permanent part of working situations in the United States?
- The two distinct phases when the supervisor will be most involved with union relations?

The Role of the Supervisor in Labor Negotiations?

- The underlying feelings involved with the beginning of collective bargaining in a plant?
- The expectations of the supervisor under collective bargaining conditions in such a union entrance?
- The important influence which the supervisor has upon negotiations?
- The background information which the supervisor is expected to know in the event of such negotiations?

Labor Agreements and the Supervisor?

- The obligation of the supervisor once a labor contract has been negotiated?
- The general types of information usually contained in such labor contracts?
- That the supervisor is responsible for carrying out many of the provisions of the contract?
- That the existence of such a contract does not relieve the supervisor of his responsibility for managerial functions?

The Role of the Manager in Contract Application?

- The responsibilities of the manager for understanding and administering such a contract?
- The two areas where supervisors generally have difficulty with labor agreements?
- What is meant by the supervisor's *right to decide?*
- The supervisor's duty to act?
- What are the duties of the shop steward?

The Role of the Manager in Grievance Adjustment?

- What is meant by the term *grievance?*
- The shop steward's role in the grievance?
- The prime responsibilities of the supervisor in handling grievances?

MANAGERIAL RELATIONS WITH THE UNION AND EMPLOYEES

Assigned Text Reading:
Chapter 19 The Supervisor and Labor Relations
Chapter 20, Adjusting Grievances

Dealing with the labor unions and working within the union agreement appears to be among the most pressing problems of many managers in water/wastewater utilities. The two chapters in the text ought to provide some insight into dealing with these problems. It may help to learn that many other supervisors share the same difficulties.

KEY POINTS

The Supervisor's Role

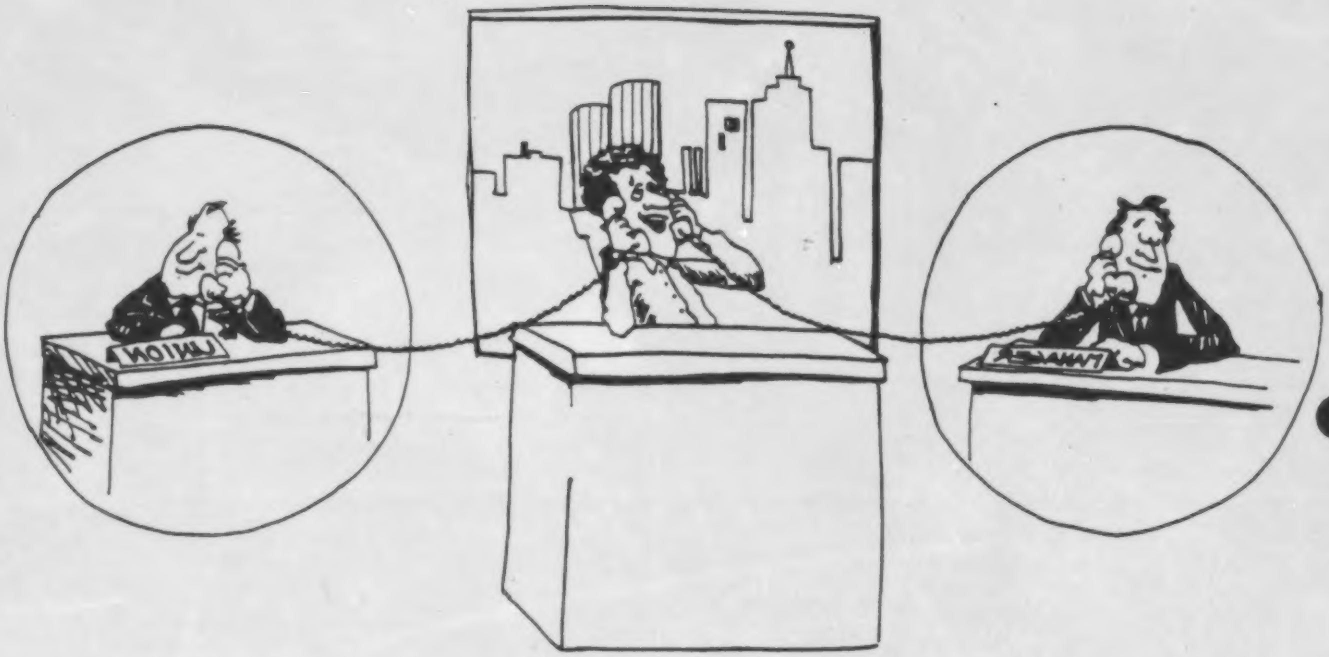
Over one-fifth of the total United States labor force is represented by labor unions, and that proportion is constantly growing. Labor unions are with us and will be increasingly important in the work of supervisors and managers.

Labor Negotiations

The initial negotiation process is the supervisor's first major contact with the union. Note that while the supervisor may not be present at the negotiating table he IS responsible for implementing the contract. Furthermore, many of the bargaining points grow out of the daily operations with which the supervisor is very familiar. This is just another reason for good communication lines for the supervisor.

Labor Agreements

Contracts tend to have similarities. Notice that such items as "hourly rates, incentive rates, hours of work, overtime, vacations, leaves of absence, seniority and such," are common to almost all contracts. Notice also that the supervisor's best course, once a contract has been established is to follow it.



The shop steward is expected to do a full days' work for the employer and be the official spokesperson to management and the union local.

Ignorance is rarely an excuse and the middle manager is no exception. That first labor agreement is probably going to contain some unfamiliar territory. The manager's best source of information at this point are the upper management personnel who originally helped draw up the contract. Living within the confines of the labor agreement is another challenge in the role of being a supervisor.

Application of the Labor Agreement

Notice the two basic areas of difficulty for the supervisor in the application of the agreement. The first area is that of the *single issue*. This is usually caused by the general nature of the contract statements and the specific situations which arise. The supervisor must apply the contract to these situations. To do this correctly, he must be well-versed in the nature of the contract as well as in the specific wording. A word to the wise middle manager: do not hesitate to ask questions, particularly those which deal with this aspect.

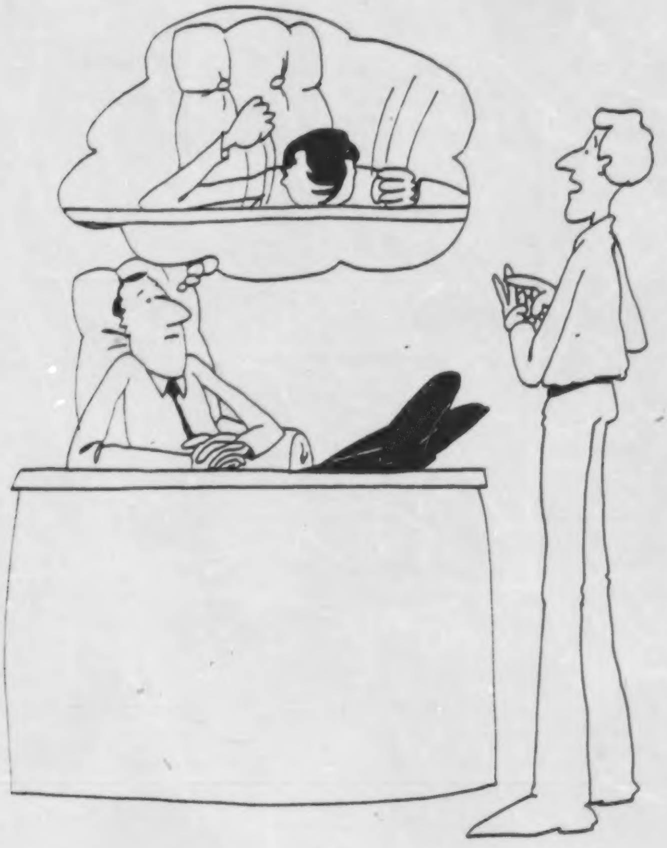
Notice that most contracts will not contain co-determination clauses which provide the supervisor with the right to make decisions without having to clear his actions with the union representative. Furthermore, the supervisor has the duty to act in enforcement of the contract.

The Shop Steward

The shop committeeman is a person who has a double role. This person is usually a full-time employee who also represents the union as the employee spokesman to management. The supervisor will probably have more dealings with the shop committeeman than with the employees in general on union matters. Good relations with the shop steward are of benefit to both the supervisor, and the shop steward--and hence, to the employees in general.

Grievance Adjustment

Notice the footnote in the text on page 338 for some formal definitions of the terms arbitrator and grievance. Grievance in the text is taken to be a formally submitted complaint. The grievance procedure is usually a complex process, consisting of several specified steps. Notice the proper sequence. If an employee comes to the supervisor, the supervisor is well advised to call in the shop steward to witness the complaint. It is not to the supervisor's benefit to undermine the shop steward's authority.



The supervisor must learn not to become angry since temper outbursts will not aid the situation.

Steps in the Grievance Adjustment Process

These are listed quite specifically in the text. They will be repeated here without explanation.

1. The supervisor should *be available* to all who want him, be they shop steward, employee, or upper management.
2. The supervisor should review the lessons on *how to listen* when complaints are being presented.
3. The supervisor must learn *not to become angry* since temper outbursts will not aid the situation.
4. The supervisor must learn how to *define the real problem*, an ability gained directly from problem solving techniques.
5. The supervisor must know how to get *all the facts*, so as to view the problem and settle the grievance.
6. Once supplied with all the facts, the supervisor must *check the contract* to determine if a grievance really does exist.
7. Once the above steps have been taken, care should be taken to avoid delay.
8. Over and above the specific situation at hand, the supervisor must evaluate the *consequences of the settlement* on future potential situations.
9. Part of the reason for evaluating the situation is that the supervisor must strive to maintain *consistency*.
10. The supervisor should use his skill at communication to *give a clear answer*, so that all will understand it.
11. The supervisor should strive to *adjust grievances at this first level*, instead of extending such situations to the higher managerial ranks.
12. The final step in this entire sequence is that of *keeping records of the transaction both as a record of the occurrence and for future similar situations*.

REVIEW

This final lesson has dealt with labor relations and employee grievance situations. These most often come to the fore through the union. Unionization of public utilities is increasing throughout the United States, and includes both production and office workers. This means that external factors are being brought to bear on the utility managers. They are dealing with the employers through other individuals, rather than directly. Also, classes and groups of utility employees belong to this union which often changes the personal relationships established during non-union years.

FUTURE REFERENCE

Labor Relations

Davis, Keith, Human Behavior at Work, Fourth Edition, New York, McGraw-Hill Book Company, 1972, pp. 286.

"Quite often a distinction must be made between an employee's actual grievance and his stated grievance. Employees sometimes do not know precisely what is making them dissatisfied. Their own feelings may set up mental blocks which prevent them from interpreting correctly what is happening. They may not have sufficient knowledge of human nature or of the many social forces impinging on them. Not knowing their actual grievances but still feeling dissatisfied, they tend to file grievances about something else. When management corrects this "something else," both management and the worker find to their surprise that dissatisfaction still exists because of some actual grievance yet uncovered. On other occasions a worker knows his actual grievance, but disguises it because he is afraid to state it directly."

The union introduces additional formal and informal organizations at work. Two major union-management activities are collective bargaining and grievance systems. Collective bargaining is negotiation between representatives of management and labor to accomplish a written agreement covering terms and conditions of employment. It is essentially a social process for balancing social pressures of two groups which have a mutual interest in employment conditions. Some important matters in negotiation are thorough preparation, constructive attitudes, clear bargaining procedures, bargaining tactics, mediation, and the problem-solving approach of integrative bargaining.

Grievance systems have as their goal the accomplishment of justice in employee relations. A grievance is defined as any real or imaginary feeling of personal injustice which an employee has concerning his employment relationship. Grievance systems help bring grievances out into the open so that corrective action can be taken (1) to adjust a current grievance and (2) to take more general action to prevent future grievances. It is questionable whether employers or unions have developed adequate grievance systems.

Lindner, Dennis G., "Organization of a Utility by Labor," Journal, American Water Works Association, Vol. 69, No. 5, May 1977, pp. 234-238.

"In management's efforts to counteract a union-organizing drive, the development of active, open communication between employer and employee is an essential basis that should be a permanent feature of policy."

FUTURE REFERENCE (continued)

McLeod, Robert J., "Communication—Key to Effective Labor Relations," Journal, American Water Works Association, Vol. 68, No. 9, September 1976, pp. 453-455.

Previously noted in the section on Communication (Lesson Three), this article chiefly relates communication to the area of labor relations.

Money, Walter C., "Effective Labor Relations," Journal, American Water Works Association, Vol. 68, No. 9, September 1976, pp. 477-478.

"Walter C. Money reports that communication is the key to effective labor relations, whether dealing with union or nonunion employees."

Snell, William, "Collective Bargaining--Its Impact on the Management Function," Journal, American Water Works Association, January 1973, pp. 40-45.

"The need for competent, knowledgeable managers is becoming increasingly important. There are several things that managers can do to remain viable..."

- They must recognize their management role.
- Managers should know what their management rights are, or at least what they think they are. They must exercise their management rights; not because they are reasonable and are being used in a reasonable and fair manner.
- When he has a contract, he must be fair in its administration.
- First-line supervisors and foremen must also be well versed in the provisions of the contract and know how to carry them out fairly.
- Management should not subsidize strikes or work stoppages.
- Be prepared with an emergency strike plan to assure that at least the essential minimum service can be carried on by using supervisory or other employees.
- A manager must know the situation thoroughly to participate on the negotiating team.

Stoner, John F., "Living with Organized Labor," Journal, American Water Works Association, Vol. 69, No. 1, January 1977, pp. 19-20.

"While a strong representative labor movement is a positive element in society, management must also remain strong and develop expertise and leadership in dealing with unions."

Supplementary Future References

Note: The first lesson stressed awareness of new trends. This portion of the Future Reference Sections provides two additional areas for reading which were not specifically discussed in depth in any lesson. The first of these areas is social responsibility, or the interface which the manager in a water or wastewater utility has with the public. Public relations is a part of this area.

The second area is that of legal responsibility. This puts the interactions between the utility system and the public into a legal perspective. More and more, utilities will have to be prepared to face the legal requirements placed upon them.

Social Responsibility

Agardy, Franklin J., "The Utility as a Target," Journal, American Water Works Association, Vol. 68, No. 9, September 1976, pp. 466-468.

Science fiction has pictured the destruction of cities through poisoning the water supply, but this is hardly in the realm of the impossible. This article deals with the intentional destruction of the utility and what should be considered to prevent such actions.

Brigham, Arthur P., "A Public Education Campaign to Conserve Water," Journal, American Water Works Association, Vol. 68, No. 12, December 1976, pp. 665-668.

Conservation of water is hardly a choice for you in the western portions of the United States these days. This article provides some suggestions for getting the public on your side.

Davies, Roger, "An Effective Public Relations Program," Journal, American Water Works Association, Vol. 68, No. 9, September 1976, pp. 456-458.

"Dealing with the press is not easy for a utility, because too frequently it occurs only when there is a crisis. Techniques for creating a friendly and mutually rewarding relationship with the press are offered by a veteran in this article."

SUPPLEMENTARY FUTURE REFERENCES (continued)

Legal Trends

Dahl, Milford W., "Contracting Entity Liabilities," Journal, American Water Works Association, Vol. 66, No. 11, November 1974, pp. 628-629.

"A public entity as well as a private citizen is liable for the acts of independent contractors should that public entity or individual employ an independent contractor." What type of clauses does your utility have to protect itself against this type of possibility?

Gill, John P., "Utility Law for Managers and Operators," Journal, American Water Works Association, Vol. 69, No. 6, June 1977, pp. 286-289.

"Unlike their nonmunicipal counterparts, utilities owned by municipalities traditionally have enjoyed immunity from tort liability... 'For now' there is not liability, but utilities should be aware of the winds of change."

Hiller, Robert L., "Potential Liabilities Faced by Utilities in Supplying Drinking Water," Journal, American Water Works Association, Vol. 69, No. 6, June 1977, pp. 290-292.

"Water suppliers, including municipalities, water companies, and water utilities must supply water that is reasonably pure; they may be held liable for injuries that result if they negligently permit water supplies to become contaminated."

Rhyne, Charles S., "The Tort Liability of a Municipal Water Supplier," Journal, American Water Works Association, Vol. 69, No. 6, June 1977, pp. 305-308.

The above aspects of utility liability dealt mainly with accidental injuries and impure water injuries. This article explores the aspect of defective equipment.

SUPPLEMENTARY FUTURE REFERENCES (continued)

Sawtelle, Robert, and Peterson, Thomas H., "Legal Counsel for Survival Through Troubled Waters," Journal, American Water Works Association, Vol. 69, No. 6, June 1977, pp. 302-304.

"The use of legal counsel by a water-utility is important to the utility's smooth operation in the face of such concerns as employment and discharge of personnel, union contracts, termination of service, and resolutions of the governing board."

Vander Vries, John N., "Legal Responsibilities of Water Utilities," Journal, American Water Works Association, Vol. 69, No. 6, June 1977, pp. 293-296.

"The legal liability of water utilities in Illinois involves aspects of water quality, fire-protection service, water-distribution-system operations, as well as environmental standards of noise pollution, and sludge disposal."

Do Not Send In

MINI REVIEW: LESSON SEVEN

Here is your last and final review quiz before the final test. Study it carefully, and check your answers with those at the bottom of the page.

_____1. If the supervisor or middle manager does not understand certain aspects of the contract, he should:

a. forget them and go on as usual.
b. have the workers explain them to him.
c. have higher management explain them to him.
d. write to the national labor union headquarters for information.

_____2. The supervisor goes over the contract provisions to check the validity of the grievance. This is known as:

a. avoiding delay.
b. adjusting grievances at the first step.
c. being consistent.
d. checking the contract.

_____3. The supervisor considers the effects of the grievance adjustment. This is known as:

a. getting the facts.
b. avoiding delay.
c. checking the contract.
d. considering the consequences.

_____4. The supervisor sometimes may feel like beating the union contract as a favor to the company--but this is not the best way to feel or act.

a. True
b. False

_____5. The final stage in the checklist as listed in the text is _________.

a. adjusting grievances at the first step
b. being consistent
c. keeping the records
d. getting the facts

* * * * *

ANSWERS: 1) c 2) d 3) d 4) a 5) c

CONCLUDING NOTE

This completes the correspondence course on supervisory management. All you have remaining is the test portion for Lesson Seven. Fill out this last test, send it in, and, if you have all Satisfactories and Superiors on your lessons, you will receive your Certificate of Completion if you are taking the course through Michigan State University.

This also concludes the saga of Wilbur Wainwright at the River City Utility. We have left Wilbur at River City--you may decide whether a suitable replacement for him was located. If so, Wilbur then returned to Deephaven and his former position. If he did so, he had several regrets about leaving River City--a place where he had done so much in such a short time. Many of those projects which he had started, he would not be able to finish. Other improvements he was not even able to start. (But then, such is the life of most able managers.)

If another able manager has not been located, then Wilbur is still at River City. His assistant back in Deephaven has been installed in Wilbur's former position, and things are going along as smoothly as could be expected under the circumstances.

Qualified managers for utilities are still fairly hard to come by. Those of you who have completed this course are helping to change that situation by becoming more skillful in your managerial skills. You are the ones who will be in demand in the future--that is one trend which you should be happy about.

Farewell and good luck.

WILBUR WAINWRIGHT
WATER UTILITY MANAGER

TEST SEVEN INTRODUCTION

At last! Only one more test portion to go! The objective questions for Lesson Seven deal with the material on union-employee-management relations. The subjective portion is a comprehensive final exam. It includes questions over the major ideas presented in Lessons One through Seven and the audit summary. The test is intended to be longer than the previous ones in order to tie together in an integrated way the new concepts you have been introduced to in this course. As with the previous lessons, comments from students enrolled in the course are found below. Good Luck!

"There was quite a lot to it (the final exam), however, it was good because I had to think of the course as a whole. The review made me think more." PDS

"Tough, long, but comprehensive and a complete course review." WR

"I have enjoyed the experience of this course and feel I have profited greatly from it. I have had fifteen years of supervisory responsibility for three different companies in three different capacities. We are never too wise but that we can learn something new. I have often quoted Stan Musial when he spoke in regards to his profession at his retirement dinner. 'There is no one of us who knows as much as all of us.' " JTH

"These questions were interesting because they brought out the whole course. They made you think--to see what you have learned and if you are able to apply it on the job." PSB

"Long! But it put much of the course together. I've had a good experience with this course." WAH

"Yes, as of today I am supervisor of both the water and wastewater plants. This course has helped me considerably. Thank you." LJD

"This final exam is very involved but it presents a thorough review of the highlights of this course." AMC

"I enjoyed this lesson most of all!" RWS

"An outstanding course. It should be a requirement of all utility management personnel." LFE

"This is not just another course where you read material and answer stock questions. You are put in real life situations where only you can give the right answer." DEW

"I'm glad it's over!! It was a real good course and I'm glad I took it." PB

Answer Sheet
Lesson Seven
To Be Sent In

LESSON SEVEN

SUPERVISORY MANAGEMENT IN THE WATER AND WASTEWATER FIELD

I. Objective Test - Lesson Seven
II. Subjective Portion - located on the following pages
  Part I. Problems from all lessons to help you combine all the material
  Part II. Total Audit Review

STUDENT'S NAME____________________________

ADDRESS_________________________________

____
CITY STATE ZIP

You have completed the course! Feel that glow of accomplishment? We hope you have gained insight and understanding regarding your role as a manager--and are putting this knowledge to work. If all parts of this test portion are graded at least passing, and if you have successfully completed all other previous lessons, you will be sent your certificate of completion and your six Continuing Education Units will be on record at Michigan State University, through the office of Continuing Education.

OBJECTIVE ANSWER SHEET
(circle the correct answer)

1. a b c d
2. a b c d
3. a b c d
4. a b c d
5. a b c d
6. a b c d
7. a b c d
8. a b c d
9. a b c d
10. a b c d
11. a b c d
12. a b c d
13. a b c d
14. a b c d
15. a b c d

	PASSING		NOT PASSING
Objective Test Score Number Right:	15 14	13 12 11	10 9 8 7 6 5 4 3 2 1 0
Subjective Portion			
Part I	Superior	Satisfactory	Not Satisfactory--do over
Part II	Superior	Satisfactory	Not Satisfactory--do over

Note: BOTH the Objective Test and the Subjective Portion must fall into the Passing category for you to receive credit for this lesson. If either or both parts are NOT acceptable, please rework that part to receive credit.
IF YOU HAVE ANY QUESTIONS, PLEASE DO NOT HESITATE TO WRITE IMMEDIATELY.

OBJECTIVE TEST: LESSON SEVEN

Fill in the answer sheet and send it in to be corrected and graded

1. Checking the contract under a grivance procedure refers to ______________.

   a. reading the labor agreement over for possible interpretation.
   b. examining the employee's contract.
   c. looking at the agreement made between the union and upper management.
   d. a length of time in which possible agreement may be reached.

2. Workers join labor unions primarily for what reason, according to the text?

   a. for social reasons
   b. for economic reasons
   c. for political reasons
   d. to escape corruption

3. One of the responsibilities of the supervisor is to consult prior records of settlements to determine whether an impending settlement is consistent with previous cases.

   a. True
   b. False

4. A requirement that a supervisor must determine together with the union what are management's rights in a particular disciplinary case is termed a/an _____.

   a. codetermination clause
   b. grievance adjustment
   c. shop steward concern
   d. arbitrator ruling

5. A complaint which has been formally presented to the supervisor or another management representative is termed a/an ______________.

   a. codetermination clause
   b. grievance
   c. chief complaint
   d. arbitrated complaint

6. Typically, supervisors become involved in union activities at two stages, negotiations and __________.

   a. organizing
   b. day-to-day application of the agreement
   c. formation
   d. the drawing up of the labor agreement

7. The initial spokesman for the employee in a grievance complaint is usually the____

   a. supervisor
   b. chief executive
   c. employee himself (or herself)
   d. shop steward

8. If the supervisor is aware of attempts to unionize, the supervisor's actions should include _______________.

   a. joining the movement, in order to be 'in' from the start.
   b. reporting the unionizers for disciplinary action by upper management.
   c. acquainting upper management with the fact that a union drive is on.
   d. doing nothing, so that the drive will hopefully fade out.

9. It is preferable to have both the shop steward and the aggrieved employee together when presenting the grievance to the supervisor.

   a. True
   b. False

10. It is in the best interests of union-mangement relationships for the supervisor to try to "beat the contract."

   a. True
   b. False

11. The existence of a labor agreement revises the five functions of a manager and eliminates some of them.

   a. True
   b. False

12. One of the more frequent areas of difficulty for supervisors in regard to labor agreements involves the interpretation of a generalized statement as it pertains to a specific instance.

   a. True
   b. False

13. Grievances should not be adjusted as soon as possible (and then, only as a desperate measure)--for interpretation to aid future employees, the matter must be carried through all the way to the top.

   a. True
   b. False

14. The supervisor frequently adds to provisions of a formal labor agreement by _____.

    a. helping in the wording of the agreement
    b. selecting the people to draft the agreement
    c. applying the provisions to specific situations
    d. working closely with upper management to obtain the most advantageous

15. Labor unions are permanent institutions in our society.

    a. True
    b. False

SUBJECTIVE PORTION, PART I

This examination is designed to provide a review of the subject matter covered in the seven lessons. In addition, it is designed to provide some practical consideration for you and to provide you with a type of experience which can be applied to real world situations.

To complete this final examination, you must complete all seven questions in this part. You will use the same general approach for each problem-solving situation even though the situations are different.

A summary outline on problem solving is included below and on the following pages. You may use this as a guide, and need not include this with your answer sheets.

These instructions, and the detailed outline which follows, are only for your benefit. You need to send in ONLY YOUR ANSWER.

Introduction

This examination consists of three parts as follows. You are to complete all three of these steps for each of the following seven questions.

I. Selection of a Problem

II. Identification of the Source of the Problem

III. Development of the Solution to the Problem

Instructions

I. SELECT A PROBLEM

You are to select an existing (or potential) problem for each requested area in this test (as listed on the following pages) that you would like to attempt to solve or for which you would like to establish the solution procedure as part of the Home Study Program. The problem can be a situation that existed prior to the Home Study Program or one that you (or other staff members) have identified since the beginning of the Home Study Program in Lesson One. Realizing that such problems often involve technical aspects, try to limit your problem area to the managerial part of the problem. You should review the problem-solving approach outline, created by Dr. Helferich, as presented in Lesson Three, Section 1.

SUBJECTIVE PORTION, PART I (CONTINUED)

II. IDENTIFY THE SOURCE OF THE PROBLEM

Once you have selected and defined the problem, please write a paragraph stating how the problem was identified. For example:

1. Was identification of the problem related to a lesson you completed where the lesson helped to point out the problem? (be specific)
2. Was identification of the problem assisted by the Management Audit? (be specific)
3. Was identification of the problem made by subordinates and brought to your attention? (be specific)
4. Other

III. DEVELOP A SOLUTION TO THE PROBLEM

Once you have selected and identified the problem, begin to solve the problem by utilizing the procedure referred to as the Management Systems Approach. As you remember from Lesson Three, Section 1, pages 159 to 165 the approach consists of five steps:

1. Define problem and objectives
2. Summarize management assumptions.
3. Develop solution approach.
4. Evaluate alternatives and recommend course of action.
5. Implement recommendation.

THE FOLLOWING SITUATION IS PRESENTED AS AN EXAMPLE:

Example of a Labor Problem:

I. Problem description.

Due to the nature of our operation, it is not deemed necessary to utilize operational personnel for weekend and holiday work, and two positions were created and titled "labor--watchmen" to handle weekend and holiday shifts. This situation worked well until recently when, during discussions of contract proposals, it was decided by the men that overtime for holiday work should be paid and that all union employees should have an opportunity to work holidays and receive overtime on a rotational basis. The two men who now are the "labor--watchmen" are upset because they feel that they are now going to have to share a "good thing" where previously they were expected to accept the nuisance of working all the holidays. This problem is further complicated by the fact that there is some confusion about whether or not they were originally employed to work holidays or whether the situation, along with their acceptance of it, just evolved. Now they are refusing to work all holidays and insist that holidays, regardless of the outcome of contract negotiations, be shared by all employees on a rotational basis.

SUBJECTIVE PORTION, PART I (CONTINUED)

Example, continued

II. Management Assumptions

It was subsequently discovered that these two men were not hired specifically for the purpose of working holidays, but for weekends only, and that their working on holidays limited the need for their coming in during the regular work week to make up hours to accumulate 40 hours a week and made it unnecessary for other employees to work holidays and evolved through a general acceptance.

A. Alternatives

It would seem that, when a contract has been agreed to, the problem of who will work holidays will be solved, though its effects may not. It is, therefore, more of an interim solution that is being sought. The alternatives are:

1. Maintain status quo where watchmen are required to work holidays.
2. Change back to the previous system where holidays were worked by all employees on a rotational basis.

B. Criteria for Evaluation

The only criteria to be evaluated here are the impact on the morale of the two men involved and possibly on the quality of the effluent. The impact on the morale of the men involved has been discussed previously in defining the problem. The impact of effluent quality involves the necessary time and effort involved in training all members of the staff in being good watchmen of all plant processes and the possibility of malfunctions during this orientation period.

III. & IV. Solution Development and Evaluation of Alternatives

Alternative one seems to be the only possibility as management cannot really change employee assignments so drastically due to a discussion at a union meeting. If this were done, a loud clamor for similar action would be heard and management would be put in the position of putting through a contract without the formality of negotiations.

V. Implementation - Course of Action

What should be done here, both now and during contract negotiations is for management to make it understood that the watchman's position at the plant is not one which everyone can necessarily carry out and it also involves some duties (such as custodial tasks) which they are unaware of or which they would not or could not carry out.

Management should also take a strong stand during negotiations on the fact that this talk is an important one and not just a plum to be passed around to equalize overtime.

Have the idea down? Then, turn the page and begin work on your final application of the content of this course to your area.

SUBJECTIVE PORTION, PART I. NAME________________________

FINAL APPLICATION

Lesson Seven
Subjective Portion
To Be Sent In

QUESTIONS (USE ADDITIONAL SHEETS AS NEEDED)

I. Question One - Motivation

Select a situation where the major problem appears to be employee motivation and solve it, utilizing the Management Systems Approach.

SUBJECTIVE PORTION, PART I. (CONTINUED) NAME______________________________

FINAL APPLICATION, CONTINUED

Lesson Seven
Subjective Portion
To Be Sent In

II. Question Two - Delegation

Select a problem which has to do with the delegation of authority. Again, solve this problem, utilizing the Management Systems Approach.

SUBJECTIVE PORTION, PART I. (CONTINUED) NAME____

FINAL APPLICATION, CONTINUED

Lesson Seven
Subjective Portion
To Be Sent In

III. Question Three - Planning

Choose a planning problem you have faced, or are facing at your utility. Solve the problem using the Management Systems Approach.

SUBJECTIVE PORTION, PART I. (CONTINUED) NAME______________________________

FINAL APPLICATION, CONTINUED

Lesson Seven
Subjective Portion
To Be Sent In

IV. Question Four - Employee Appraisal

Give an example of a problem situation in employee appraisal and performance evaluation and solve it, utilizing the Management Systems Approach.

SUBJECTIVE PORTION, PART I. (CONTINUED) NAME________________________________

FINAL APPLICATION, CONTINUED

Lesson Seven
Subjective Portion
To Be Sent In

V. Question Five - Positive Discipline

Describe a situation where you required and used positive discipline or would have used it had you been aware of it. This need not be a problem-solving approach question as much as a descriptive one.

SUBJECTIVE PORTION, PART I. (CONTINUED) NAME______________________________

FINAL APPLICATION, CONTINUED

Lesson Seven
Subjective Portion
To Be Sent In

VI. Question Six - Controlling

Review the system you use for management control within your area of responsibility. Select one problem and outline an approach to solving the problem utilizing the Management Systems Approach.

SUBJECTIVE PORTION, PART I. (CONTINUED) NAME________________________

FINAL APPLICATION, CONTINUED

Lesson Seven
Subjective Portion
To Be Sent In

VII. Question Seven - Labor

State a labor or grievance problem which you have faced, and outline the solution utilizing the Management Systems Approach.

SUBJECTIVE PORTION, PART II.

Supervisory Management Audit
Total Review

In the Appendix you will find a copy of all of the Supervisory Audit Questions as they have appeared through this manual. Using the answer sheet on the next page - go to those questions, and indicate those questions which have changed since you answered them earlier. You should review all parts of your completed audit to see if the responses reveal any deficiencies. Management Audit procedures similar to the one you have completed are being utilized in many industrial situations to reveal management problem areas.

NAME________________

Lesson Seven
Subjective Portion
To Be Sent In

SUBJECTIVE PORTION, PART II.

Supervisory Management Audit, Total Review Answer Sheet

A. Objectives

	YES	NO	NA
1.			
2.			
3.			
4.			
5.			
6.			
7.			
8.			

B. Planning

1a.			
b.			
c.			
d.			
e.			
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
12.			
13a.			
b.			
c.			
d.			
e.			
f.			
g.			
14.			
15.			

B.	YES	NO	NA
16.			
17.			
18.			
19.			
20.			
21.			
22.			
23.			
24a.			
b.			
25.			

C. Organization

1.			
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
12.			
13.			
14.			
15.			
16.			

D. Staffing

1.			
2.			
3.			
4.			
5.			

D.	YES	NO	NA
6.			
7.			
8.			
9.			
10.			
11.			
12.			
13a.			
b.			
c.			
d.			
e.			
f.			
g.			

E. Directing

1.			
2a.			
b.			
c.			
d.			
e.			
3.			
4.			
5.			
6.			
7.			
8.			
9a.			
b.			
10.			
11.			
12a.			
b.			
13.			
14.			

NAME ____________________

SUBJECTIVE PORTION, PART II. (CONTINUED)

TOTAL REVIEW ANSWER SHEET, CONTINUED

E. Directing (cont.)

	YES	NO	NA
15.			
16.			
17.			
18a.			
b.			
c.			
d.			
e.			
f.			
19.			
20.			

F. Controlling

1.			
2.			
3.			
4.			
5a.			
b.			
c.			
6.			
7.			
8.			

G. Labor Relations

1.			
2.			
3.			
4.			
5.			
6.			
7.			

G. Labor Relations (cont.)

	YES	NO	NA
8a.			
b.			
c.			
d.			
e.			
f.			
g.			
h.			
i.			
j.			
k.			
l.			

Finished? Then just send this to:

Self-Study Course Coordinator
432 Eppley Center
Michigan State University
East Lansing, MI 48824

YOU ARE FINISHED... WELL DONE... It is hoped that this course was a pleasant learning experience for you, and that you are far more of an accomplished manager for having spent all those long hours pouring over the books. Congratulations, you deserve it. If you have successfully passed all the previous lessons, and have done well on this last objective test and this final exam, you will be receiving your certificate of completion shortly, as well as your scores for these last examinations.

Your six Continuing Education Units will be recorded with the Office of Continuing Education at Michigan State University, where they will remain on file for your future reference or use.

Lesson Seven
Evaluation Sheet
To Be Sent In

NAME ______________________

EVALUATION SHEET - LESSON SEVEN

Please take just another minute to complete this evaluation sheet. Your answers here will provide us with your opinion of this lesson, and are one of the prime means that we have for improving the course.

1. How accurate and appropriate did you find the case example for Lesson Seven? (Circle the best answer or write your own)

   Very Realistic   So-so, at least it did not turn me off   Basically inappropriate

2. What part of this lesson did you find most interesting?

3. What part did you find least interesting? (Please tell us why, too)

4. How was the objective test?

   I found it too hard   OK   I found it too easy

5. What did you think of the subjective portion of this lesson?

6. Have you encountered similar situations to those as discussed in Lesson Seven, apart from your answers in the subjective portion?

   NO   YES (could you please describe)

7. Do you have any other comments on this lesson or on the course in general? Please use the reverse side of this sheet if necessary.

We really appreciate these evaluations and comments. It has been great having you in the course! (Hope you feel the same!) Congratulations and best of luck!

Name ____________________

Address ____________________

____

____

Soc. Sec. No. ____________

Lesson Seven
Graduate Certificate Information

You have finished the course!! Congratulations! Now for some hard earned and well deserved rewards! Is there someone who could formally present your Certificate to you (your boss, city council, the mayor)?

If so, please list their name below. We will send your Certificate directly to them so that they may make the presentation to you.

Name of Presentor: ____________________

Title of Presentor: ____________________

Address of Presentor: ____________________

____

____

In addition, is there anyone else you'd like us to inform of your successful completion of the course (your boss, local newspaper, government agency)? If so, please list all names and addresses here:

Name: ____________________

Title: ____________________

Address: ____________________

____

____

Name: ____________________

Title: ____________________

Address: ____________________

____

____

Name: ____________________

Title: ____________________

Address: ____________________

____

____

APPENDIX

SUPERVISORY MANAGEMENT AUDIT
FOR
WATER/WASTEWATER TREATMENT FIELD

PREPARED BY:
DR. OMAR KEITH HELFERICH
CONTENT CONSULTANT

What is this audit, you ask? This audit is a series of questions which you are to answer as they pertain to your current situation on the job. Through answering these questions, you will begin to glimpse your present management skills and will be able to identify areas where you could improve.

SUPERVISORY MANAGEMENT AUDIT

Introduction

Before management problems can be alleviated, they must be indentified.

"What are our system needs?" This is the question each utility-management team should be asking, according to a statement in the May, 1971 special issue of Willing Water. The special issue further states that recognition and acceptance of these needs is a prime prerequisite of programs that will provide further improvements in service and quality. As part of the Action Now program, AWWA developed a self-evaluation questionnaire to assist in appraising the technical needs of a utility. Michigan State University, through the AWWA-WPCF-sponsored Institute for Water and Wastewater Utility Management, developed a self-evaluation audit format that will assist a utility in appraising management-related problems. Use of a practical management-audit format should provide benefits to water and wastewater utilities.

Can audit procedures define management problems?

There are several examples of the practical application of the audit approach to management. Everyone is generally familiar with the accounting audit, which checks actual cost records against the accepted standard procedures. Auditing was for many years associated with and considered a part of accounting only. The essential purpose of the audit was to provide an examination by a firm of outside auditors to determine the financial condition and to uncover errors and fraud. Today modern management in business, with its greater complexities, requires a close check on the entire scope of management control and performance. The objective is to achieve the most effective and efficient administration of the total business operation with continuous improvement in policies and procedures. The management audit can be defined as:

> A comprehensive and constructive examination of an organizational structure of a company or its components such as division or department, its plans and policies, its financial control, its methods of operation, and its use of human and physical facilities.

The objective of the management audit is to reveal defects or irregularities in any of the elements of the organization under study. The purpose of a management audit is to achieve:

- Reduction of waste and deficiencies
- Improved methods
- Better means of control
- More efficient operations
- Greater use of human and physical facilities

Conclusions

The water and wastewater utility industry has recognized the management needs of the industry for many years. However, for various reasons individual utilities have not defined their own particular management deficiencies. Several factors suggest that this situation will be corrected. First and foremost is the increased interest and effort from within the industry in being professionals in management skills and in the performance of their utility operations. The major associations also have clearly demonstrated increasing interest and effort in management development for the industry. Second, there are pressures that will force increasing interest in the recognition and solution of management deficiencies in the industry. These include but are not limited to: (1) the transition from construction to operations as more new plants come on line; (2) greater pressure by governmental agencies for some form of certification at all levels, possibly including supervision and management; and (3) greater involvement in the review of utility performance by public-interest groups. There is no easy way to recognize, define, and solve management problems, but a management-audit procedure will be of assistance to a utility management team.

APPENDIX

Supervisory Management Audit

A. Objectives

1. Does your group have defined objectives?

2. Have written objectives been prepared for the group?

3. Are the objectives distributed to all subordinates?

4. Do the subordinates understand all of the objectives?

5. Are the reasons ("why") for the objectives understood?

6. Are the objectives reviewed and updated at least twice per year?

7. Do subordinates participate in setting the objectives?

8. Can you and your superior(s) measure and judge the level to which the objectives are achieved?

B. Planning

1. Do you plan for

   a. a week?
   b. a day?
   c. one shift?
   d. a month?
   e. longer than a month?

2. Are you informed concerning the long range plans and objectives of the organization?

3. Are your subordinates fully informed of the plans for your group or department?

4. Do you have policies, procedures, and methods written to assist in guiding you in your responsibilities to carry out top management objectives?

5. Do you utilize a budget stated in time, material, money, or other units?

6. Do you assist in preparation of the budget?

7. Are results compared with the budget to study and analyze the variations?

8. Do you make a projection of the future to forecast the equipment, space, material, etc. which your group will require?

B. Planning (continued)

9. Do you make a projection to forecast the number and qualifications of employees?

10. Are you familiar with the trends in wages, fringe benefits, and costs?

11. Do you check with available staff specialists to prepare forecasts?

12. Do you consider the tactics of timing, joint action, and approach to implementing changes in developing your plans?

13. Do your plans consider utilization of resources:

    a. tools and equipment?
    b. work methods and processes?
    c. space?
    d. materials and supplies?
    e. supervisory time?
    f. employee time?
    g. full utilization of work force?

14. Do you attempt to make the new employee's transition as smooth as possible?

15. Do you do on-the-job training yourself and/or assign this duty to a qualified subordinate?

16. Are subordinates encouraged to take advantage of training opportunities?

17. Do you formally evaluate your subordinates at least annually?

18. Is a formalized system of evaluation used (a merit rating or performance appraisal system)?

19. Is an appraisal form utilized for performance evaluation?

20. Do you personally perform an appraisal interview with each subordinate?

21. At the close of the interview do you make certain that the employee has a clear understanding concerning his (her) rating?

22. Are employees generally promoted from within the group?

23. Are seniority, merit, and ability considered as criteria for promotion?

24. Do you attempt to ensure that wages paid in your group are equitable

    a. internally within the group?
    b. externally with the going rate for similar jobs in the organization and community?

25. Do you review wage and salary information collected by personnel and/or yourself?

Appendix
Audit
Do NOT Send In

C. Organization

1. Are the jobs of the group clearly defined?

2. Are the jobs assigned?

3. Is authority adequately delegated?

4. Are two-way lines of communication established between yourself and your subordinates?

5. Does each employee have a single immediate supervisor?

6. Do you supervise a reasonable number of employees?

7. Does each employee know what standards are expected of him (her)?

8. Are you inclined to assign the more difficult tasks to the most capable employees?

9. Is your group attached to the organization in a line capacity? in a staff capacity?

10. Is your position described in an organization manual?

11. Are activities grouped by function?

12. Do you have a subordinate who is currently qualified to take over your position?

13. If you do not have a qualified understudy for your position, are you training someone as an understudy?

14. Have organization charts, manuals, and position descriptions been prepared?

15. Do you know the leader of the informal organization within your span of control?

16. Do you actively work with and build good relations with the informal leader?

D. Staffing

1. Have you defined the specific qualifications for employees hired for your group?

2. Do you interview, select, and hire from candidates the individual you consider most appropriate for a particular position?

3. Are all new employees assigned to specific jobs?

D. Staffing (continued)

4. Is each new employee introduced to the specific details of his (her) job, rules, hours, etc.?

5. Do you follow up and check on each employee's performance?

6. Do you discipline your subordinates?

7. Do you discharge a subordinate if necessary?

8. Are you responsible for determining the need for employees in your department or group?

9. Do you participate in writing the job descriptions for your group?

10. Do you participate in writing the job specifications required of an employee for each job category?

11. Have you utilized the directive interview technique?

12. Have you utilized the nondirective interview technique?

13. Do you prepare for an employment selection interview by:

    a. acquainting yourself with background information on each applicant?
    b. preparing a schedule or plan for the interview?
    c. selecting a proper location for the interview?
    d. trying to place the applicant at ease?
    e. generating two way communication?
    f. attempting to eliminate your personal preferences and prejudices?
    g. being as honest as possible with each applicant about the selection decision?

E. Directing

1. Do all directives or orders come only from you as the supervisor?

2. Are all of your directives:

    a. reasonable in terms of being able to accomplish the task?
    b. understood by the subordinate?
    c. issued in appropriate tone and words to stimulate willing and enthusiastic acceptance?
    d. compatible (consistent) with the purposes and objectives of the organization?
    e. specify time limit to complete the task?

3. Do you generally choose autocratic, close supervision giving direct, clear, and precise orders to subordinates with detailed instructions?

E. Directing (continued)

4. Do you generally consult with the employee concerning a problem before making a decision and issuing a directive?

5. Do you allow the employee to work out the details of an assigned task?

6. Are the reasons behind your directives explained to your subordinates?

7. Do you help your subordinates understand the need and impact of change before the change is implemented?

8. Do subordinates share in the decisions involved in implementing change?

9. Are you alert to the factors influencing morale:

   a. external (sickness in the family, hobbies, etc.)?

   b. internal (job security, appreciation for a job well done)?

10. Are your subordinates reminded of how significantly they contribute to overall objectives?

11. Do you generally act toward your employees as a leader who has the situation well in hand and can rely upon employees to help correct the situation if something goes wrong?

12. Do you attempt to measure morale through:

   a. observation (levels of productive efficiency, tardiness and absenteeism, accident and safety records, etc.)?

   b. morale and attitude surveys?

13. Are new rules introduced with an explanation to subordinates what is expected of them and why the rules are needed?

14. Do you follow the rules that you expect subordinates to observe?

15. Is your disciplinary action taken with sensitivity and sound judgment to discipline subordinates as appropriate?

16. Is a thorough investigation conducted before taking disciplinary action?

17. Is disciplinary action taken in private with the employee involved?

18. Do you in general utilize the ideas of progressive disciplinary action as follows:

   a. informal talk?
   b. oral warning or reprimand?
   c. written or official warning?
   d. disciplinary layoff?
   e. demotion?
   f. discharge?

Appendix
Audit
Do NOT Send In

E. Directing (continued)

19. In taking disciplinary action, do you follow the "hot stove rule" attempting to begin the disciplinary process as soon as you notice the violation, warn subordinates in advance of the consequences of violations, applying discipline consistently and impersonally?

20. Does each subordinate have the right to appeal disciplinary action?

F. Controlling

1. Are controls available to assist in correcting deviations from established standards as soon as possible so as to minimize the time lag between results and corrective action?

2. Do you have enough familiarity with the jobs of your subordinates to determine which jobs should be observed daily, weekly, monthly, etc.?

3. Are the controls utilized economical and adequate for the jobs under your responsibility?

4. Are the controls utilized flexible to adjustment if warranted?

5. Do you follow the three basic steps essential for control:

    a. set standards for measuring performance?
    b. checking on performance versus standards or goals?
    c. take corrective action for variations from standards?

6. Is a budget used in your control process?

7. Do you participate in making the budget for your group?

8. Is there some flexibility in the budget through regular budget reviews?

G. Labor Relations

1. Are you permitted to express your opinions in reference to labor negotiations?

2. Are you kept informed about the course of labor negotiations?

3. Do you keep records that would be useful in labor negotiations (incidents, absenteeism, productivity, etc.)?

4. Do you thoroughly understand the labor agreement?

5. Do you consult with higher management on labor clauses for interpretation?

G. Labor Relations (continued)

6. Is appropriate action taken if a subordinate does not comply with contract provisions?

7. Can you develop a proper relationship and communication with the union steward?

8. Do you observe the following check list for grievances:

   a. be available to the shop steward and to any aggrieved employee?
   b. listen to the grievance?
   c. do not become angry?
   d. summarize what has been presented and define what is actually the problem?
   e. get the facts related to the grievance?
   f. check the labor agreement to determine if the contract has been violated?
   g. settle the grievance as soon as possible?
   h. consider consequences of the settlement to make certain the decision is consistent?
   i. be an consistent as possible explaining any exceptions?
   j. answer each grievance in a straight-forward, reasonable manner?
   k. adjust grievances at the first step of the grievance procedure if possible?
   l. keep records on all settlements?

The Executive Programs of the Graduate School of Business Administration of Michigan State University—

- —Hosting over 4000 executives in more than fifty workshops, seminars and short courses annually.
- —Serving diverse associations and corporations in the business and industrial community for over over a quarter of a century.
- —Specializing in providing leadership in developing innovative executive programs.
- —Supported by a professional staff of distinguished program consultants, administrators, and professors.
- —Dedicated to excellence in the vital life-long educational experience of executives.

Michigan State University, founded in 1855—

—The nation's pioneer land-grant university; devoted to the life-long educational concept.

—Offering over 165 programs of undergraduate instruction and graduate study in more than 75 areas of study.

—Supported by more than 3000 faculty in 17 colleges; ranked among the top twelve universities in the U.S.

The Kellogg Center for Continuing Education, a complete executive educational facility—

—Hosted over one million conferees.

—Encompassing 21 conference rooms, 193 guest rooms, public and private dining rooms, and an executive library.